

NAME:

STREAM:

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CHEMISTRY

MARCH-2024

2 hours

CHEMISTRY DEPARTMENT

UGANDA CERTIFICATE OF EDUCATION

CHEMISTRY

PAPER 1

2 HOURS

Instructions.

- This paper consists of two sections: A and B. it has six examination items
- Section A has two compulsory items.
- Section B has two parts; I and II. Answer one item from each part
- Answer four items in all.
- Answers to section A must be written in spaces provided while those of section B must be written on answer sheets provided.
- Any additional items answered will not be scored.

Section-A

Item 1.

Sunrise juices, a popular bar in Entebbe Uganda is facing quality control issues. Customers have been complaining about the taste and appearance of their signature orange juice, citing an unpleasant chemical after taste and an unnaturally bright orange color. The manager is worried about the reducing

the decreasing number of customers on daily basis which is affecting the daily income.

Task.

As a chemistry learner.

a. Point out the problem manager makes while choosing the product.

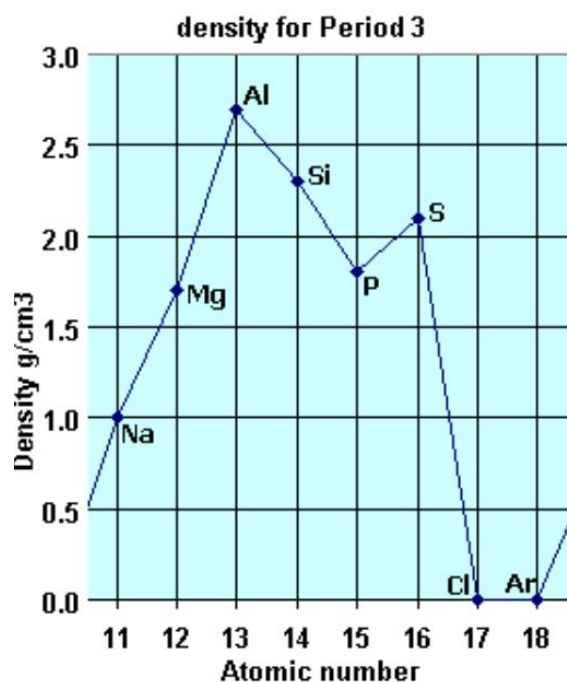
b. Help her know the functioning of the product.

c. Advise her on the challenges associated with long term use of the products.

d. Take her through evaluation of the product.

Item 2

A chemistry class is embarking on an exciting investigation into the properties of elements in the period 3. Their chemistry teacher Mr. James has challenged them to research about the diversity of physical properties among those elements. They collected data about densities of period 3 elements and presented it graphically.



However, they got with challenged with analyzing their results and came to you for help.

Task.

As a chemistry learner:

a. Explain the category of substances.

b. Help the learners analyze their research results.

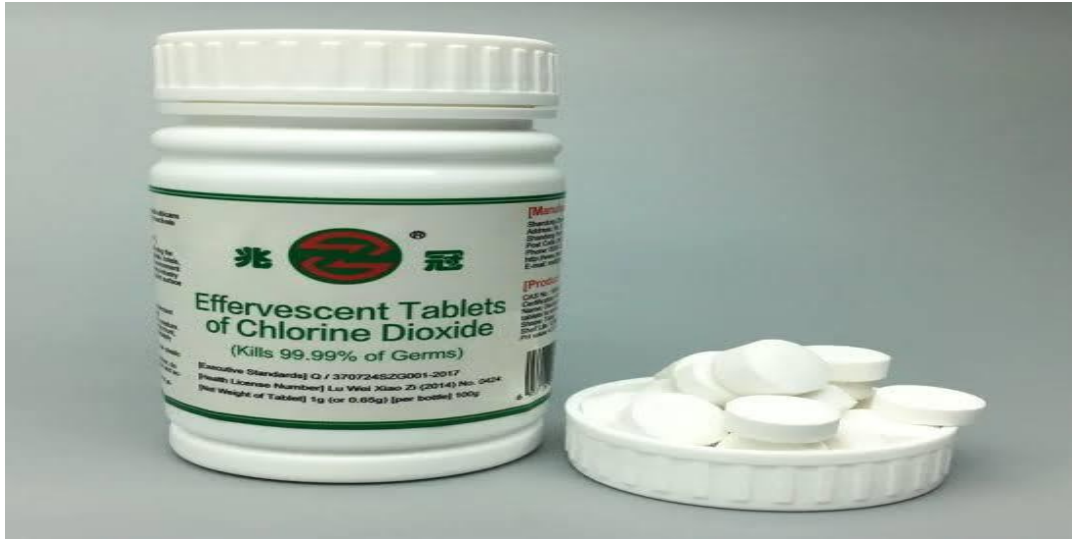
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Section-B

(part-1)

Item 3

1. There has been a high demand for disinfectants in Uganda as the country is encouraging need for sanitation and hygiene in our communities. The private investors, however are concerned about the availability of chlorine as the best chemical used in manufacturing the disinfectants and as a result, they have requested the government to allow them set up a chlorine manufacturing plant near lake Katwe. The natives however, are raising alerts in relation to the Social benefits and its environmental Impacts Once the government accepts the request of investors.



Representatives from a few schools have been appointed to create awareness to the natives of Villages along lake Katwe.

Item 4.

According to the independent, a media forum, there has been a rise in cases of collapsing buildings in Uganda registering the collapsed building near Speke Courts hotel, Jinja as the recent. Ugandans associate the collapsing to low amount and quality of cement used. The government has therefore responded by contracting a private Investor to set up a cement manufacturing plant in Rocky regions of Kyenjojo. Residents however are not convinced yet about how this will boost their society and its effect to their community.



The Independent seeks to educate the masses through an article in their forum to give back up to the government for their idea and has appointed to come up the write up.

Part II

Item 5.

Kyamulagara is a growing trading Centre in Katooke sub county. It's surrounded by many swamps and this has encouraged agriculture, grazing of cattle and brickmaking among the residents to support life. Reports from the village show that most of the water has become dirty and smells badly, floods are rampant. This has Caused the District environment team to organize meetings with the residents to expose to them information about the issue.



You have been invited as an educated member to be part of the meeting.

Task:

As a chemistry learner, organize presentation that will be used to talk to the residents. **(11 scores)**

Item 6.

4. Kyanite village is a hilly village in Kyenjojo district known for its rich vegetation, stones and swamps. As a result, stone quarrying, grazing and making bricks is common. Recently, they have registered deaths of their cattle, trees drying up and falling and water smelling.



Residents have raised alarms to the district officials and as a result, the district through the environmental conservation team has organized a meeting to address to them details of the issues at hand.

Task:

As a chemistry learner, make a report that you will be used for address. **(11 scores)**