THE UNITED REPUBLIC OF TANZANIA NATIONAL EXAMINATIONS COUNCIL OF TANZANIA DIPLOMA IN SECONDARY EDUCATTION EXAMINATION

713 GEOGRAPHY

Time: 3 Hours ANSWERS Year: 2022

Instructions.

- 1. This paper consists of sections A and B with a total of Fourteen (14) questions.
- 2. Answer all questions from section A and four (4) questions from section B.
- 3. Section A carries forty (40) marks and section B Carries sixty (60) marks.
- 4. Cellular phones are **note** allowed in the examination room.
- 5. Write your **examination Number** on every page of your answer booklet(s).



SECTION A (40 Marks)

Answer all questions from this section. Each question carries 4 marks.

1. (a) Identify the teaching aids which can be used to teach students how to locate a position using longitude and latitude

The suitable teaching aids for this lesson are a globe, a world map marked with lines of latitude and longitude, and an atlas. A chalkboard sketch of a grid system can also be useful during class explanations.

(b) Explain how the teaching aids can be used in carrying out the lesson

The teacher can use the globe to demonstrate the actual positions of the Equator and Prime Meridian and how latitude and longitude lines run across the Earth. The world map helps to show positions of specific places using coordinates. An atlas allows students to practice locating places individually or in groups, while a chalkboard sketch can be used to illustrate exercises and examples interactively during the lesson.

2. Show the uniqueness of the equatorial climate

The equatorial climate is unique because it experiences high temperatures averaging 25°C to 28°C throughout the year with very little seasonal variation. It also receives heavy and evenly distributed rainfall exceeding 2000mm annually.

The region is characterized by **high humidity**, **dense evergreen forests**, **and daily convectional rainfall often accompanied by thunderstorms**. The climate supports a **rich diversity of plant and animal life** not commonly found in other regions.

3. Examine the influence of tensional and compressional forces on the formation of a rift valley

Tensional forces cause the Earth's crust to stretch and break, forming faults. As blocks of land between parallel faults subside, a **rift valley is created**. Examples include the East African Rift Valley.

On the other hand, **compressional forces** push land masses towards each other, which can lead to faulting when the crust cannot bend. In some cases, compressional forces cause blocks of land to sink between two faults, also forming a **rift valley**, though less commonly than tensional forces.

4. Briefly analyse the detrimental impacts due to the presence of the mining industry

Mining causes **environmental degradation** through deforestation, soil erosion, and water pollution from chemicals like mercury and cyanide.

It leads to **displacement of communities** as land is cleared for mining operations, disrupting people's lives and livelihoods.

Mining areas often experience **land conflicts and social problems** due to competition over resources and poor working conditions.

Additionally, **health hazards** such as respiratory problems, accidents, and exposure to toxic substances are common among mine workers and nearby communities.

5. Show how Chemistry, Agriculture, Demography and Biology relate to Geography

Chemistry contributes to Geography through the study of soil composition, rock weathering processes, and atmospheric gases.

Agriculture is linked to Geography in analyzing land use, climate patterns, soil types, and crop suitability for different areas.

Demography supports Geography by providing **population data and trends** essential for studying settlement patterns, resource use, and urbanization.

Biology relates to Geography through the study of ecosystems, vegetation types, and biodiversity distribution across different environments.

6. (a) Explain what spatial ability is

Spatial ability is the mental capacity to **visualize**, **interpret**, **and manipulate objects in space**. It enables one to understand the positions, shapes, and relationships of objects in relation to each other and to one's own position.

(b) Identify three functions of spatial thinking

It helps individuals to **navigate and find locations** using maps and directions.

It aids in **interpreting and analyzing spatial data**, such as population distribution and weather patterns.

It allows for **problem-solving in geography** by understanding physical processes like landform formation or human settlement layouts.

7. Elaborate the relevance of the print media, audio-visual media, models and real objects in teaching Geography

Print media such as textbooks and maps provide reliable, organized content for reference and classroom discussions.

Audio-visual media like documentaries and films offer **real-life visuals and sounds** that enhance students' understanding of geographical phenomena.

Models such as relief and globe models give **three-dimensional representations** of geographical features, making abstract concepts more concrete.

Real objects like rocks, soil samples, or weather instruments provide **hands-on learning experiences**, allowing students to interact with actual items they study in theory.

8. A scenario of Mwanshamba who saw her photograph which was taken when she was two years old. Briefly explain the strengths of that type of photograph

That photograph is a **Ground photograph**.

- it is easy to interpret the image of objects observed on the photograph,
- > they are less expensive to produce compared to other type of photographs
- > they are most familiar photographs compared to other forms
- > they can be used as an aid to field sketching
- > they give more easily data of the areas.

9. A scenario of a TANAPA manager who warned that not everything brought by tourists should be accepted. Support this statement by giving four points

Some tourists may bring **invasive plant or animal species** that could harm local ecosystems. Certain items, like **illegal hunting equipment or banned substances**, could threaten wildlife and park security.

Accepting inappropriate cultural items could **undermine local traditions and values**, causing cultural conflict or disrespect.

Some imported products may cause **environmental pollution**, such as plastic waste, affecting the park's cleanliness and ecosystem health.

10. Distinguish the concepts renewable resources, non-renewable resources, firewood and biomass

Renewable resources are natural resources that can be replenished naturally within a short period, like sunlight, wind, and water.

Non-renewable resources are those that take millions of years to form and cannot be replaced once exhausted, such as coal, oil, and minerals.

Firewood is **wood collected from trees and shrubs** for burning as fuel, a type of biomass used for cooking and heating.

Biomass refers to organic material derived from plants and animals, including firewood, crop residues, animal dung, and other plant-based fuels.

SECTION B (60 Marks)

Answer all questions from this section. Each question carries 15 marks.

11. Show the positive impacts of population policy in Tanzania

One positive impact of Tanzania's population policy is the **improvement of maternal and child health services**. Through public education and health programs, the policy has helped reduce birth complications and infant mortality rates.

The policy has also contributed to **balanced population growth**, promoting family planning services and encouraging families to have manageable numbers of children, which eases pressure on resources and public services.

Another impact is the **promotion of gender equality and women's empowerment**. By advocating for education on reproductive health and equal opportunities, the policy has increased women's participation in education, employment, and decision-making.

Finally, the policy has enhanced **public awareness about population issues and resource management**. It has encouraged responsible resource use and environmental conservation to sustain the growing population.

12. Explain why areas around volcanic mountains are densely populated despite the potential danger of erupting

Areas around volcanic mountains are densely populated because the **volcanic soils are very fertile**. These soils are rich in minerals, making them ideal for farming crops like bananas, coffee, and vegetables, which attract many people to settle and cultivate the land.

Such regions often have **abundant water sources from streams and rivers** flowing down the mountain slopes, making it easier for communities to access water for domestic use, irrigation, and livestock.

Additionally, volcanic areas tend to have **pleasant and cooler climates** compared to surrounding lowlands, making them attractive for human settlement.

There are also **economic opportunities through tourism and trade**, as volcanic landscapes and craters attract tourists, and the fertile lands support agricultural businesses.

13. Suggest five methods of assessment which they can use to orient the newly employed teachers

One method is **oral interviews**, where new teachers are asked questions to assess their understanding of subject content, teaching methodology, and classroom management.

Another method is through **classroom observation**, where experienced educators observe the new teachers while conducting lessons and provide constructive feedback on their performance.

They can also use **written tests or quizzes** to evaluate teachers' knowledge of subject content, professional ethics, and education policies.

Peer assessment is useful, where new teachers are paired with experienced colleagues to exchange teaching practices, observe each other, and share feedback.

Lastly, **self-assessment forms** can be given to new teachers to reflect on their strengths, weaknesses, and areas needing improvement, which promotes self-awareness and professional growth.

14. Support the statement that teaching and learning geography cannot be successful without the use of inquiry-based teaching strategy

Inquiry-based teaching is essential in Geography because it encourages **students to actively explore and investigate geographical problems**, such as causes of deforestation or patterns of urbanization, instead of passively receiving information.

This strategy promotes **critical thinking and problem-solving skills**, as learners are guided to ask questions, collect data, and draw conclusions from geographical evidence and real-world situations.

Geography often involves **studying dynamic and complex phenomena** like weather patterns and migration trends, which inquiry-based learning handles effectively by involving students in research, fieldwork, and practical investigations.

Finally, inquiry-based teaching makes Geography **more meaningful and relevant**, as it connects classroom lessons with everyday life and the environment around students, making them more curious, engaged, and better informed about their world.