

**THE UNITED REPUBLIC OF TANZANIA
MINISTRY OF EDUCATION AND VOCATIONAL TRAINING
FORM TWO SECONDARY EDUCATION EXAMINATION, 2012**

051

FOOD AND NUTRITION**Time: 2:30 Hours****ANSWERS****Year: 2012****INSTRUCTIONS**

1. This paper consists of sections **A, B** and **C**.
2. Answer **ALL** questions from sections **A** and **B**,
and only **ONE** from section **C**.
3. **ALL** answers must be written in the spaces provided.
4. Write your examination number at the top right corner of every page.
5. **ALL** writing must be in blue or black ink **EXCEPT**
diagrams which must be in pencil.
6. Cell-phones are not allowed in the examination room.

FOR EXAMINER'S USE ONLY		
QUESTION NUMBER	SCORE	INITIALS OF EXAMINER
1		
2		
3		
4		
5		
6		
7		
8		
9		
TOTAL		

SECTION A (20 Marks)

1. For each of the following items (i) - (x), choose the correct answer and write its letter in the box provided.

(i) The nutrient that provides energy for body activities is

- A. Protein
- B. Carbohydrates
- C. Vitamins
- D. Minerals

B

Reason: Carbohydrates are the body's primary energy source, broken down into glucose to fuel cellular and physical activities.

(ii) The age range for adolescence is approximately

- A. 1–5 years
- B. 6–12 years
- C. 13–19 years
- D. 20–30 years

C

Reason: Adolescence typically spans ages 13–19, encompassing the teenage years characterized by puberty and rapid growth.

(iii) The part of meat suitable for stew system is called

- A. Tough cuts
- B. Tender cuts
- C. Fatty cuts
- D. Boneless cuts

A

Reason: Tough cuts, such as chuck or brisket, are ideal for stewing, as slow, moist cooking breaks down connective tissues, making them tender.

(iv) Waste from bathrooms and sinks is referred to as

- A. Organic refuse
- B. Liquid refuse
- C. Solid refuse
- D. Chemical waste

B

Reason: Wastewater from bathrooms and sinks, often called grey water, is classified as liquid refuse, distinct from solid or chemical waste.

(v) The primary nutrients found in leafy greens are

- A. Proteins and fats
- B. Carbohydrates and sugars
- C. Vitamins and minerals
- D. Fats and oils

C

Reason: Leafy greens, like spinach and kale, are rich in vitamins (e.g., Vitamin A, C, K) and minerals (e.g., iron, calcium), supporting various body functions.

(vi) Proper dental care involves

- A. Avoiding cold water
- B. Brushing teeth twice daily
- C. Eating sugary snacks
- D. Using only herbal toothpaste

B

Reason: Brushing teeth twice daily with fluoride toothpaste removes plaque and prevents cavities, as recommended by dental health guidelines.

(vii) The laundry process that enhances the brightness of white clothes is

- A. Starching
- B. Bleaching
- C. Ironing
- D. Soaking

B

Reason: Bleaching uses chemical agents to remove stains and restore brightness to white clothes, particularly effective for cotton fabrics.

(viii) First Aid does NOT include

- A. Stopping severe bleeding
- B. Providing temporary care
- C. Performing surgery
- D. Checking for breathing

C

Reason: First Aid involves immediate, temporary actions like controlling bleeding or checking breathing, but surgery requires professional medical expertise.

(ix) Using acidic substances like lemon juice on aluminum can

- A. Polish the surface
- B. Cause corrosion
- C. Strengthen the metal
- D. Remove stains completely

B

Reason: Acidic substances, like lemon juice, react with aluminum, causing corrosion or discoloration due to chemical interaction with the metal.

(x) The deficiency disease caused by lack of niacin is

- A. Scurvy
- B. Pellagra
- C. Rickets
- D. Beriberi

B

Reason: Niacin (Vitamin B₃) deficiency causes pellagra, characterized by dermatitis, diarrhea, and dementia, often linked to poor dietary intake.

2. Write TRUE if the statement is correct and FALSE if the statement is not correct in the space provided.

- (i) Infants should be exclusively breastfed for the first six months. **TRUE**
- (ii) Smoke inhalation can lead to respiratory problems. **TRUE**
- (iii) Immunization prevents diseases like tuberculosis. **TRUE**
- (iv) A frying pan is suitable for boiling vegetables. **FALSE**
- (v) Respect and kindness are examples of bad behavior. **FALSE**
- (vi) High fibre intake promotes healthy digestion. **TRUE**
- (vii) Soft water causes soap scum on laundry. **FALSE**
- (viii) Dusting should be done after mopping the floor. **FALSE**
- (ix) A tenant is responsible for property maintenance. **FALSE**
- (x) Fatigue is a common symptom of early pregnancy. **TRUE**

3. (a) Give the meaning of:

(i) Health Education

Health education is the process of providing people with information and skills that enable them to improve and maintain their health by making informed decisions and adopting healthy lifestyles.

(ii) Sanitation Services

Sanitation services are public or private health services aimed at promoting hygienic conditions by managing waste disposal, providing clean water, and controlling disease-causing environmental hazards.

(b) Identify four health education topics taught in schools.

- (i) Personal hygiene
- (ii) Nutrition and balanced diet
- (iii) Prevention of communicable diseases
- (iv) Environmental sanitation

(c) State three ways to prevent foodborne illnesses at home.

- (i) Washing hands and utensils thoroughly before handling food
- (ii) Storing perishable foods properly in a refrigerator
- (iii) Cooking food to the appropriate safe temperatures

4. (a) Give three causes of marasmus.
- (i) Severe deficiency of calories and protein in the diet
 - (ii) Poor weaning practices or early cessation of breastfeeding
 - (iii) Frequent infections and diseases that reduce appetite
- (b) Give three symptoms of marasmus.
- (i) Extreme thinness with visible bones
 - (ii) Sunken eyes and wrinkled skin
 - (iii) Weakness and lack of energy
- (c) (i) Mention three ways of preventing marasmus.
- Ensuring children receive a balanced and adequate diet
 - Proper breastfeeding and gradual weaning practices
 - Educating families on child nutrition and hygiene
- (ii) Write three ways of treating marasmus.
- Providing nutrient-rich and energy-dense foods
 - Treating infections and illnesses promptly
 - Giving vitamin and mineral supplements
5. (a) Describe six steps for laundering colored clothes.
- (i) Sorting colored clothes separately from whites and delicate items
 - (ii) Using cold or lukewarm water with mild detergent
 - (iii) Washing gently by hand or using a washing machine with care
 - (iv) Rinsing thoroughly to remove all soap
 - (v) Hanging clothes to dry in the shade to avoid color fading
 - (vi) Ironing if necessary using the appropriate temperature
- (b) Write the importance of the following treatments in laundry work for white cottons.
- (i) Boiling:
- Helps to remove stubborn stains and dirt
 - Kills germs and bacteria, making clothes hygienic
- (ii) Starching:
- Gives the fabric a crisp, smooth finish
 - Makes clothes easier to iron and keeps them looking neat
- (c) State two factors to consider when laundering delicate fabrics.
- (i) Use of mild detergent and lukewarm water
 - (ii) Gentle hand washing and avoiding wringing

6. (a) Give four reasons for proper food storage.
- (i) To prevent food spoilage and wastage
 - (ii) To maintain the freshness and nutritional value of food
 - (iii) To protect food from contamination and pests
 - (iv) To ensure food safety and reduce the risk of foodborne illnesses
- (b) Outline five factors to consider when planning a balanced meal.
- (i) The age and health condition of the person
 - (ii) Availability and cost of food items
 - (iii) Nutritional value of the food
 - (iv) Food preferences and cultural practices
 - (v) The season and weather conditions
- (c) State four suitable methods for cooking poultry.
- (i) Boiling
 - (ii) Roasting
 - (iii) Grilling
 - (iv) Stewing

7. Discuss six socio-economic factors affecting food security in Tanzania.

One factor is poverty. Many families cannot afford to buy or produce enough food due to low income, leading to hunger and malnutrition.

A second factor is unemployment. Lack of job opportunities reduces people's purchasing power, limiting access to quality and sufficient food.

Third, poor infrastructure affects transportation of food from rural farms to markets, causing shortages and higher prices in some areas.

Fourth, inadequate agricultural technology limits food production, as many farmers still depend on traditional tools and unreliable rainfall.

Fifth, population growth increases demand for food, putting pressure on available resources and leading to food scarcity.

Sixth, poor land ownership systems and conflicts over farming land reduce agricultural productivity, affecting household food availability.

8. Explain seven ways to prevent accidents during food preparation in the kitchen.

One way is to always clean up spills immediately to prevent slipping and falling.

A second way is to store sharp tools like knives properly and use them carefully while cutting.

Third, use dry cloths or gloves when handling hot pots, pans, or oven trays to avoid burns.

Fourth, keep flammable items such as paper, towels, and plastic away from stoves and open flames.

Fifth, turn pot handles inward while cooking to prevent them from being knocked over.

Sixth, avoid overcrowding the kitchen, especially when cooking with children around, to reduce the chance of accidents.

Seventh, ensure that electrical appliances are in good condition and switch them off after use to prevent shocks and fires.

9. Describe six advantages of exclusive breastfeeding and four reasons why some mothers opt for formula milk.

One advantage is that it provides complete and balanced nutrition for the baby's growth and development.

A second advantage is that it strengthens the baby's immune system, protecting against infections like diarrhoea and respiratory diseases.

Third, it promotes mother-child bonding, creating emotional security for the baby.

Fourth, exclusive breastfeeding reduces the risk of chronic diseases like obesity and diabetes in later life.

Fifth, it helps the mother recover quickly after childbirth by contracting the uterus and reducing bleeding.

Sixth, it is convenient and economical, requiring no preparation or financial cost.

Four reasons why some mothers opt for formula milk include illness, where a mother's health condition prevents breastfeeding. A second reason is insufficient breast milk production. Third, returning to work or school makes formula feeding easier to manage. Lastly, personal preference or medical advice may lead mothers to use formula milk.