

FORM TWO CSSC EXAMINATION - 2026

FOOD AND HUMAN NUTRITION

MARKING SCHEME

SET 01

1.

Section A

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

1 marks each @ 10 marks

2.

i	ii	iii	iv	v
N	O	L	M	K

4 marks each @ 5 marks

3. @ Nutrients required for the following result

i Minerals example Calcium and phosphorus

ii Carbohydrates protein and fat

iii Minerals example Iron, protein and Vitamin C

iv Minerals example Iodine

1 mark each @ 4 marks

b Importance of dietary fibres

i It lowers cholesterol and blood glucose levels

ii Dietary fibres prevent constipation

iii It regulates body weight

iv It speeds up the passage of food through the digestive tract

2 marks each @ 8 marks

4. Benefits of fruits

- i They reduce the risk of cancer; Fruit rich in Vitamin and antioxidants play an important role in preventing and managing cancer such as breast cancer and liver cancer.
- ii Fruits improve eye health; mangoes, avocados, papayas and watermelon are good source of Vitamin A
- iii They aid in digestion; most fruits contain fibres which aid in digestion, hence preventing constipation
- iv Fruit improve hair health; Citrus fruit, Strawberries and pineapple are excellent hair Stimulant
- v They enhance body immunity; Vitamin C-rich fruit such as oranges, pineapples and papayas, improve body immunity.
- vi Fruit reduce the risk of developing kidney stones; Citrus fruit such as Oranges and lemons have large amounts of Vitamin C.

2 marks each @ 10 marks

5. Benefits of beverages

- i They replace the water lost from the body through sweating, excretion and breathing hence, they help maintaining the level of body fluids
- ii They provide social function roles as they are served at most meeting and are a part of expecting hospitality
- iii They maintain normal bowel function. They aid in food movement along the gut thus preventing constipation
- iv They help to Stimulate the body during Seasoning of the year example winter Seasoning the tea can be used to Stimulate the body against coldness.

- iv Beverage Stimulate one's appetite for food. for example; Soup can be used as an appetizer for stimulating appetite.
 - v Many beverage contain Carbohydrate or Caffeine which can provide a quick energy boost
 - vi Cold beverages like sodas and fruit juice can be refreshing, especially during hot weather.
- 2 marks each @ 10 marks

6. a) Malnutrition; Refers to the body condition which results from inadequate, excess or imbalance intake of one or more nutrient for a long time. The forms of malnutrition include Under-nutrition and Over-nutrition.

2 marks

b) i) Iron-deficiency anaemia; Also called nutritional anaemia occurs when the body lacks sufficient iron to produce an adequate amount of haemoglobin, the protein in blood cells that carries oxygen.

ii) Vitamin A deficiency; Is a condition resulting from insufficient Vitamin A in the body. It may be due to inadequate dietary intake or other causes such as excessive alcohol consumption.

iii) Iodine deficiency disorder; Is a condition resulting from inadequate intake of iodine the body needs iodine to make thyroid hormones.

iv) Rickets in children; Is a condition which occurs in children due to inadequate intake of Vitamin D. Vitamin D plays a vital role in the absorption of calcium and phosphorus.

2 marks each @ 8 marks

7. a) Food additives; are substance added to food to enhance its flavour, appearance, texture and extend its shelf life. They can be natural or synthetic. They are normally added when food is prepared and eventually become a component of the food.
1 mark

b) Guidelines for Using food additives

i) Must be safe to use; food additives should not pose any health risk when consumed.
ii) Must be used as intended; food additives should be used specifically for their intended purpose in the food.

iii) Must be compatible; food additives must be chemically and physically compatible with the food and other ingredients.

iv) Must meet the technological justification; the additives must have a valid technological function such as preservation, flavour enhancement or colour retention.

v) Must be used in required amount; food additives must be used according to their specification. The correct amount of it should be used in food.
2 marks

c) Five categories of food additives with its examples:

i) Food colouring agent; are substance used to enhance the visual appeal of food by adding or restoring colour. example beet-root, turmeric and beta-carotene.

ii) Preservatives; are substance added to food to prevent spoilage. Caused by microorganisms like bacteria, mould and yeast or chemical changes like oxidation.

iii) Flavouring; are substances added to food to enhance or modify its natural taste and aroma. They make the food more palatable and appealing to consumers hence increasing consumers acceptance.

iv Seasoning and Condiments : are also added to foods to play the same role as flavourings in food. The commonly used seasonings include salt, spices and herbs.

v Stabilisers and Thickeners
- These are food additives used to maintain or improve the texture, consistency and appearance of food products.

1 mark each @ 5 marks

8. @ Proper nutrition : Means getting a balanced meal together with performing regular physical activities such as running and walking. Good health depends on proper nutrition.
1 mark

Importance of proper nutrition in the body

- i Strengthening the body's immune system : proper nutrition builds body immunity. A body with strong immunity will not be affected easily by diseases.
- ii Maintain the required energy level in the body : the body needs energy to perform various activities. For example the digestion process requires energy.
- iii Improve physical and mental health : proper nutrition makes the body active and strong. eating meals that contain adequate amount of nutrients allows a person to have a healthy mind.
- iv Help in maintaining healthy body weight : proper nutrition helps an individual to achieve the required body weight.
- v Helps a person to live longer : consuming a meal rich in nutrients increases lifespan. healthy eating makes the body strong and prevent certain diseases.

1 mark each @ 5 marks

i) Anorexia nervosa; Is an eating disorder characterized by an abnormally low body weight, an intense fear of gaining weight and a distorted perception of weight.

ii) Bulimia nervosa; This is an eating disorder characterized by consuming a large amount of food in a short period. Therefore, the person tries to induce vomiting or use diet pills and other medications.

iii) Binge eating disorder (BED)

- This is an eating disorder characterized by consuming large quantities of food in a short period, similar to bulimia nervosa.

iv) Pica

Pica is an eating disorder which involves eating non-food items that lack nutritional value such as dirt, chalk, charcoal or even ice. This condition is most commonly observed in children and pregnant women. 1 marks each @ 4 marks

9. @ Vulnerable group: Is a group of people who are at a higher risk of harm, discrimination, poor health, poverty, exploitation or social exclusion compared to the general population. Example of vulnerable group: Children and adolescents, older adults, pregnant women, refugees and migrants. 2 marks

SECTION C (15 marks)

10. a) Malnutrition ; is a body condition which results from inadequate, excess, or imbalance intake of one or more nutrient for a long time. Each nutrient has specific functions in the body and it must be adequately consumed for proper growth, development and overall health.

b) Groups affected by malnutrition

i) Older adults (elderly)

- Chronic illness that interfere with nutrient absorption or metabolism

ii) Lactating (breastfeeding) mother

- Increased nutrient requirement for fetal growth

iii) Infant and young children

- Frequent infection such as diarrhoea, which reduce nutrient absorption

iv) People with disabilities

- Physical or mental conditions that make feeding difficult

v) People living with chronic illness (eg HIV/AIDS, tuberculosis)

- Poor appetite and reduced nutrient absorption caused by the disease or its treatment

vi) Adolescent. During this period, they have higher nutritional requirements than during pre-puberty and adulthood

Introduction = 1.5 marks

Main body = 12 marks

Conclusion = 1.5 marks