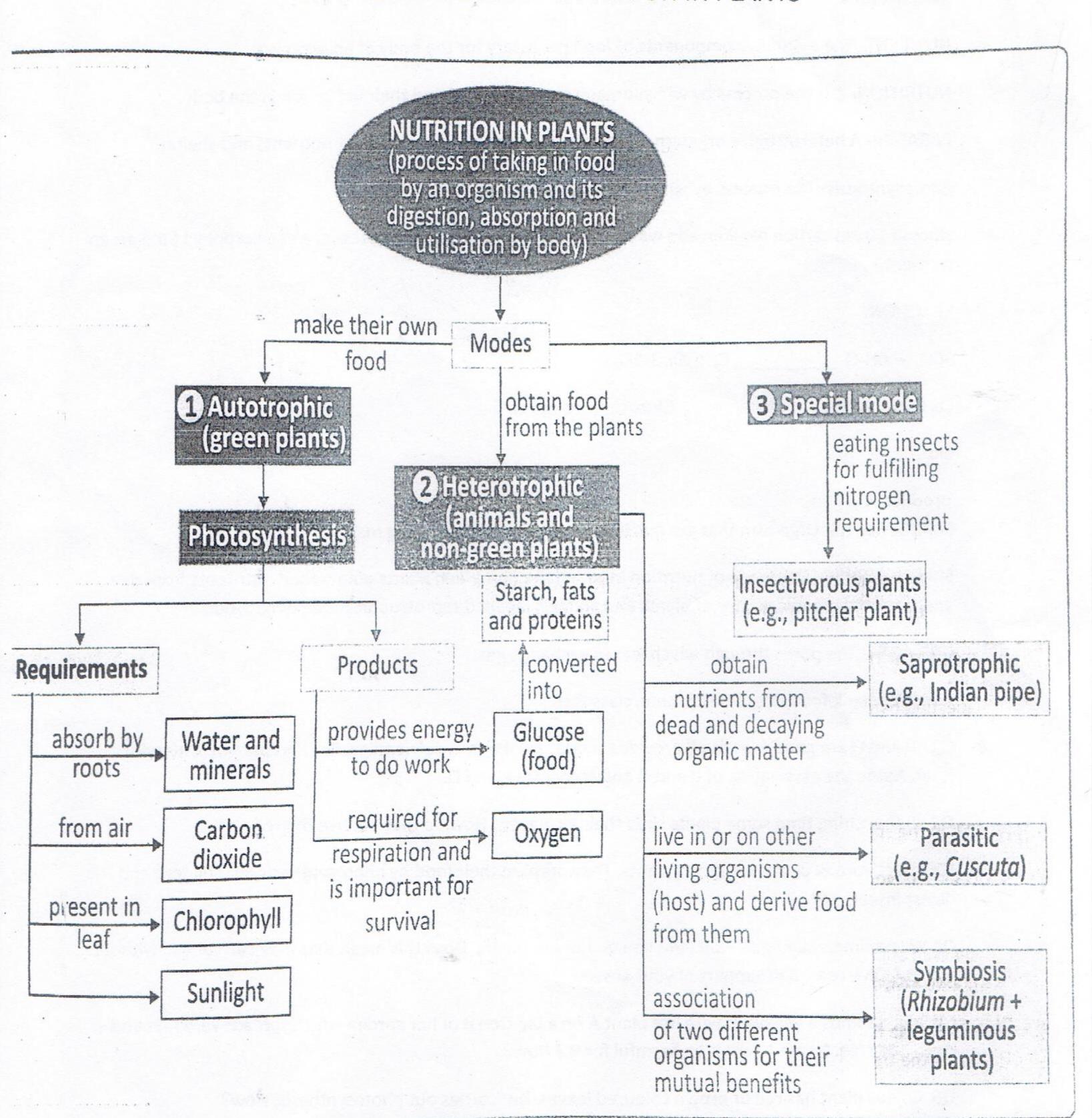
# J.K.G INTERNATIONAL SCHOOL

# SUBJECT - SCIENCE

CLASS - VII

# CHAPTER AT GLANCE - NUTRITION IN PLANTS



#### **KEY WORDS-**

AUTOTROPHIC-The mode of nutrition in which an organism makes its own food from simple substances.

HETEROTROPHES-Organism having heterotrophic mode of nutrition.

HOST- An organism on which parasite depends for nutrients and shelter.

INSECTIVOROUS- Those green plants which obtain their food partly from insects are called insectivorous.

NUTRIENT- The essential components of food necessary for the body of an organism

NUTRITION- It is the process by which organism take in food and their utilization in the body.

PARASITE- A heterotrophic organism depending on the other organism for nutrients and shelter.

Photosynthesis- The process by which green plants make their food (

glucose) from carbon dioxide and water by using solar energy in the presence of chlorophyll (the green pigment)

**REACTION:** 

$$6CO_2 + 6H_2O$$
 \_\_\_\_\_\_  $C_6H_{12}O_6 + 6O_2$ 

Carbon water Glucose oxygen

dioxide

product -oxygen

SAPROTROPHS- Organism that get nutrition from dead and decaying matter.

SAPROTROPHIC- The mode of nutrition in which the non green plants obtain their nutritents from dead and decaying organic matter of plants and animals is called saprotrophic mode of nutrition.

STOMOTA- The pores through which leaves exchange gas.

Question bank for enrichment activity/class test

Q1 P and Q are good friends . P provides shelter , water and nutrients while Q prepares and provides food. Name the association of P and Q and recognize P and Q.

Q2 In the spring time some plants shed their all leaves . How do they survive then?

Q3 Insectivorous plants are green plants. They prepare their food by photosynthesis but still trap and digest insects. Why?

Q4 Wild animals like tiger, wolf, and lion do not eat plants. Does this mean that they can survive without plants? Give reason in support of your answer.

Q5 Seema finds a yellowish wire like plant A on a big tree B of her garden which spreads very first and cover the tree. Name A, will it be harmful for B ? How?

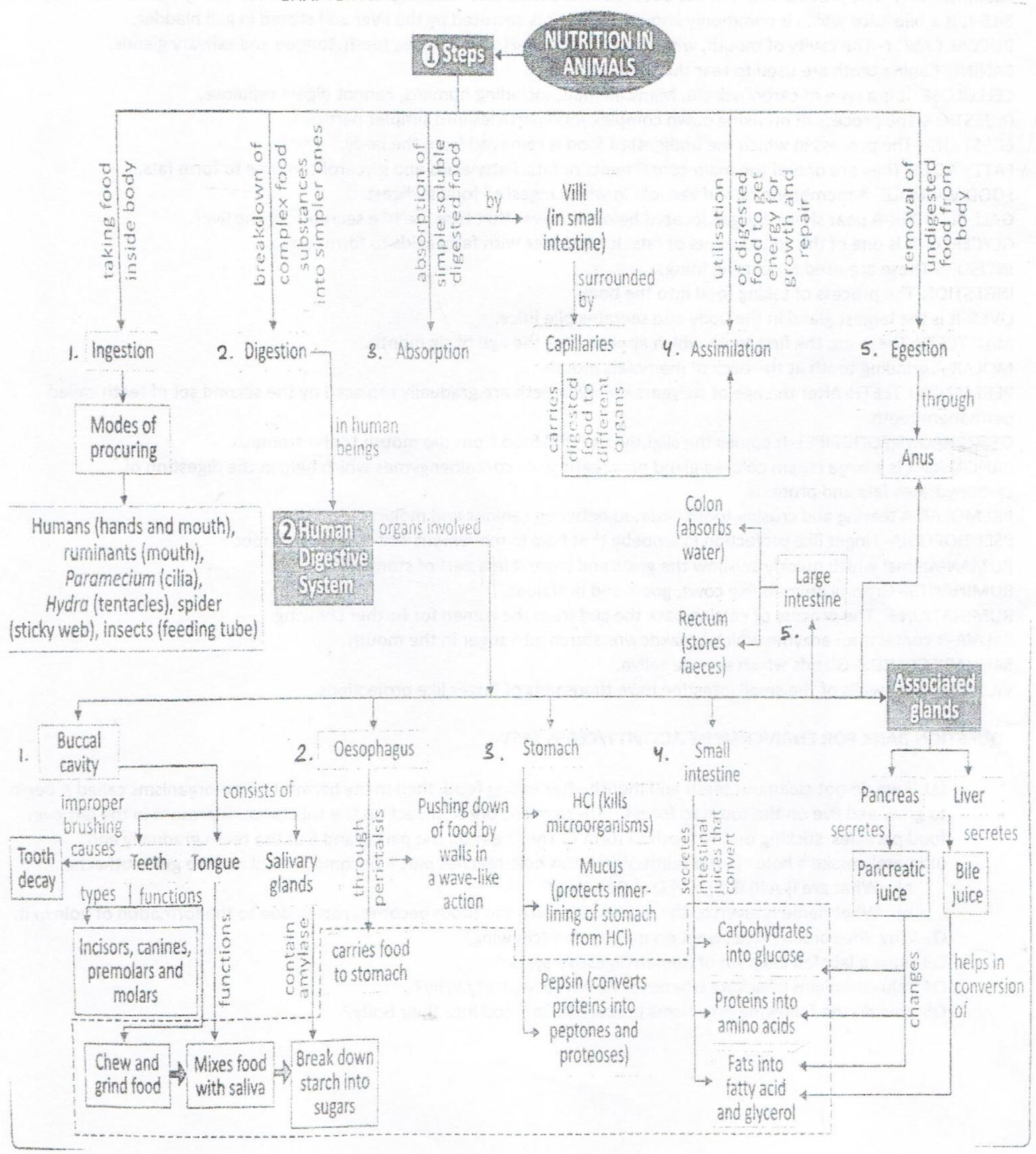
Q6 Coleus plant has red or brown coloured leaves, but carries out photosynthesis. How?

# JKG INTERNATIONAL SCHOOL

# SUBJECT-SCIENCE

CLASS-VII

## CHAPTER AT GLANCE - NUTRITION IN ANIMALS



#### **CHAPTER – NUTRITION IN ANIMALS**

#### **KEYWORDS-**

ABSORPTION- The process by which digested food particles are taken up by the walls of the intestines.

AMINO ACID-Amino acids are the building blocks which combine to form complex molecules like proteins.

AMOEBA- It is a single cell organism. It ingests its food with the help of pseudopodia.

ASSIMILATION- The process in which the absorbed food is taken in body by cells and used for energy, growth and repair.

BILE-It is a bile juice which is commonly known as bile. It is secreted by the liver and stored in gall bladder.

BUCCAL CAVITY- The cavity of mouth, with all its internal parts like cheeks, teeth, tongue and salivary glands.

CANINE- Canine teeth are used to tear the things like flesh.

CELLULOSE- It is a type of carbohydrate. Many animals, including humans, cannot digest cellulose.

DIGESTION-The process of breaking down complex food particles into simpler particles.

EGESTION-- The process in which the undigested food is removed from the body.

FATTY ACIDS-They are one of the main constituents of fats. Fatty acids and glycerol combine to form fats.

FOOD VACUOLE- A membrane bound vacuole in which ingested food Is digested.

GALL BLADDER-A pear shaped organ located below the liver that tore the bile secreted by the liver.

GLYCEROL- It is one of the constituents of fats. It combines with fatty acids to form fats.

INCISORS-These are used for cutting things.

INGESTION-The process of taking food into the body.

LIVER-It is the largest gland in the body and secretes bile juice.

MILK TEETH-These are the first teeth which appear after the age of six month.

MOLAR-A grinding tooth at the back of mammals mouth.

PERMANENT TEETH-After the age of six years the milk teeth are gradually replaced by the second set of teeth called permanent teeth.

OESOPHAGUS(FOODPIPE)- It comes the slightly digested food from the mouth to the stomach.

PANCREAS-It is a large cream colored gland pancreatic juice containengymes which help in the digestion of carbohydrates fats and proteins.

PREMOLAR-A tearing and crushig tooth situated between canines and molars.

PSEUDOPODIA- Finger like projection in amoeba that help in movement and capturing of food.

RUMAN-Animal which quickly swallow the grass and store it in a part of stomach.

RUMINANTS – Grazing animals like cows, goats and buffaloes.

RUMINATION - The process of getting back the cud from the rumen for further chewing.

SALIVA-It contains an enzyme which breakdowns starch into sugar in the mouth.

SALIVARY GLANDS- Glands which secrete saliva.

VILLI-The inner walls of the small intestine have thousands of finger like projections.

#### QUESTION BANK FOR ENRIVCHMENT ACTIVITY/CLASS TEST-

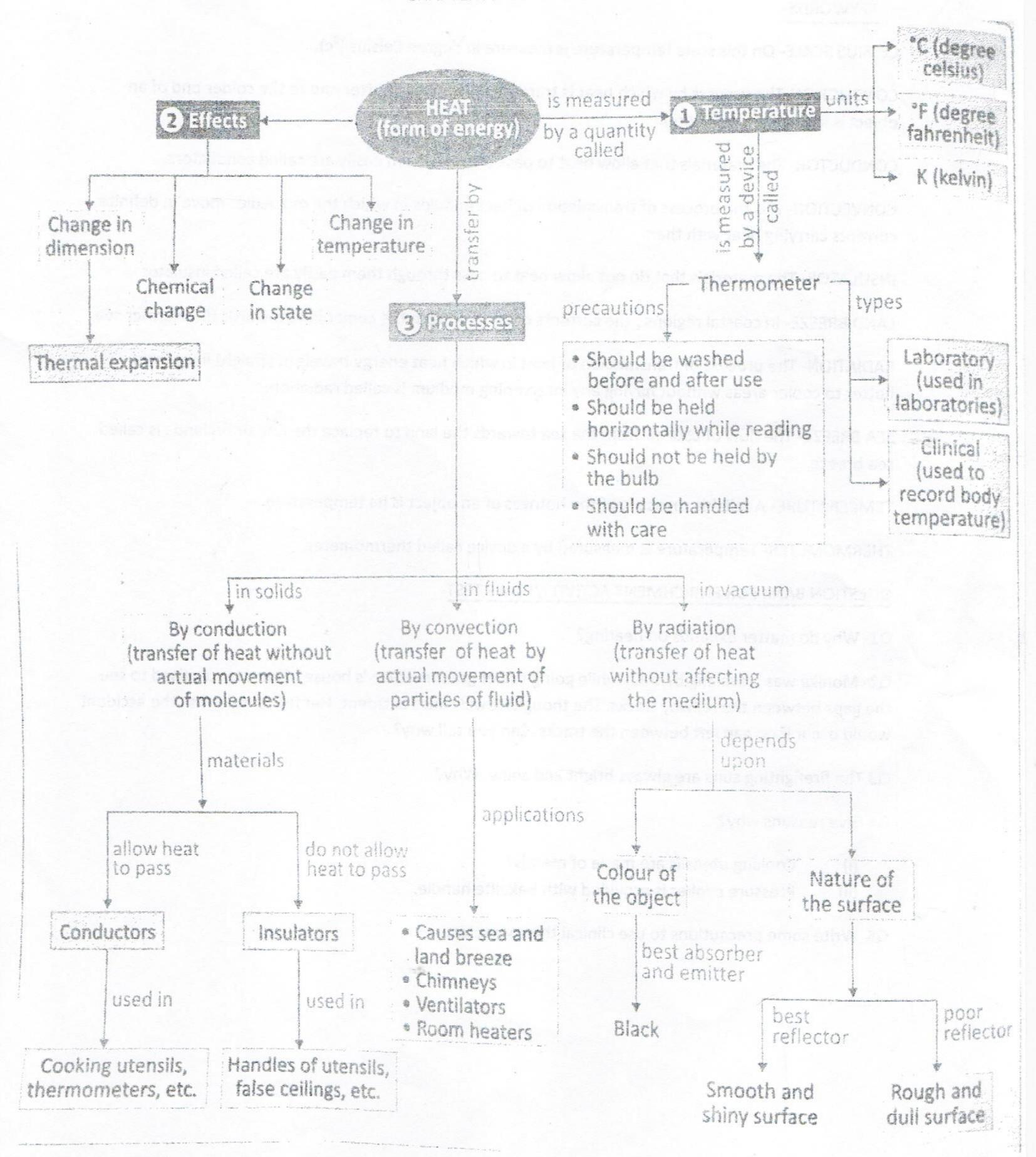
Q1 If we do not clean our teeth and mouth after eating food, then many harmful micro-organisms called A begin to grow and live on the tooth to form C. These micro-organism act on the substance B present in the left over food particles sticking on the tooth to form C. The C eat up the part D and E of the teeth gradually and ultimately make a hole in the teeth. When this hole reaches part F become painful and we get toothache.

- a) What are i) A ii) B iii) c iv) D v) E and vi) F
- b) What name Is given to the process in which the tooth becomes rotten due to the formation of hole in it.
- Q2 Why does bread taste sweet on mastication (chewing)
- Q3 Draw a labeled diagram of human digestive system.
- Q4 Raju complains of acidity whenever he eats irregularly. Why?
- Q5 How do the following organisms procure (take) food into their body?

### SUBJECT-SCIENCE

### CLASS-VII

## CHAPTER AT GLANCE -HEAT



#### **KEYWORDS-**

CELSIUS SCALE- On this scale temperature is measure in degree Celsius (°c).

CONDUCTION-The process by which heat is transferred from the hotter end to the colder end of an object is known as conduction.

CONDUCTOR- The materials that allow heat to pass through them easily are called conductors.

CONVECTION- It is the process of transmission of heat in fluids in which the molecules move in definite currents carrying heat with them.

INSULATOR- The materials that do not allow heat to pass through them easily are called insulator

LAND BREEZE- In coastal regions, the currents of air flow from the cooler land towards the warmer sea.

RADIATION- The process of transmission of heat in which heat energy travels in straight lines from hotter to cooler areas without having any intervening medium is called radiation.

SEA BREEZE- The flow of cool air from the sea towards the land to replace the hot air on land , is called sea breeze.

TEMPERATURE- A reliable measure of the hotness of an object is its temperature.

THERMOMETER- Temperature is measured by a device called thermometer.

QUESTION BANK FOR ENRICHMENT ACTIVITY/CLASS TEST-

- Q1- Why do matter expands on heating?
- Q2- Monika was travelling by train while going to her grandmother 's house . She was surprised to see the gaps between the railway tracks. She thought it will cause accident. Her father said that the accident would occur if no gap left between the tracks. Can you tell why?
- Q3 The firefighting suits are always bright and shiny. Why?

Q4 Give reasons why?

- (i) Cooking utensils are made of metals?
- (ii) Pressure cooker is provided with Bakelite handle.
- Q5 Write some precautions to use clinical thermometer.