

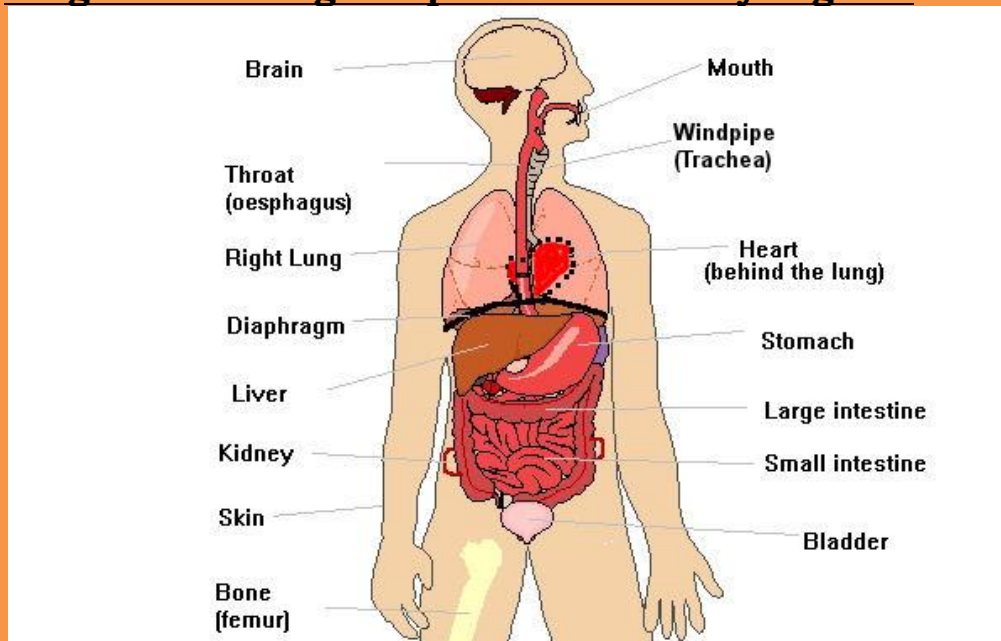
P.4 SCIENCE WEEK8

MAJOR ORGANS OF THE BODY

Examples of body organs

- i) Eye
- ii) Brain
- iii) Ears
- iv) Stomach
- v) Urinary bladder
- vi) Heart
- vii) Lungs
- viii) Liver
- ix) Kidney
- x) Skin

Diagram showing the positions of body organs.



ACTIVITY

1. Name atleast two major organs of the human body.
2. State the position of the ears on a human body.
3. Name the organ of the body which is a sense organ of touch and feeling.
4. Name other major sense organs of the body.

5. Name the organ that pumps blood to all parts of the body.
6. Draw the head part of a human body and locate the ears, eyes and nose.

THE BRAIN

- i) The brain is found in the head
- ii) The brain is protected by the skull.

Diagram showing the position of the brain



Uses of the brain

- i) For thinking
- ii) For body balance
- iii) For body balance
- iv) For storing information
- v) For learning.

Care for the brain

- i) Having enough rest.
- ii) Avoid drugs like alcohol, marijuana, tobacco.
- iii) Eat a balanced diet.
- iv) Having physical exercises to refresh the brain daily.

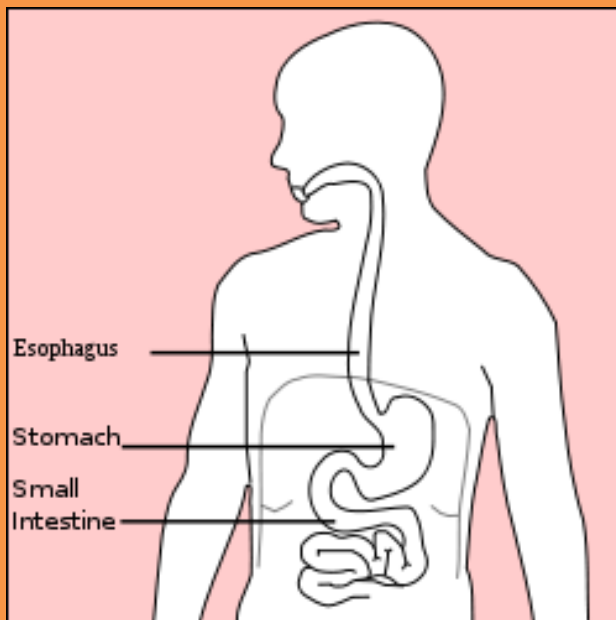
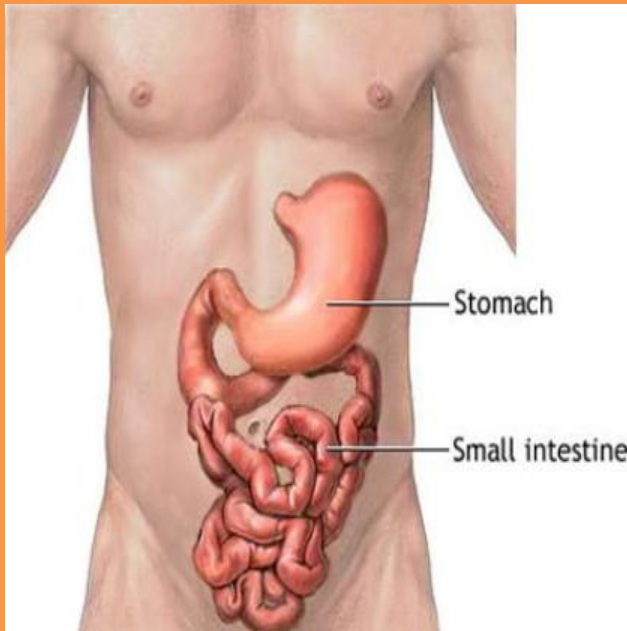
ACTIVITY

1. State the position of the brain in the human body.
2. Name the part of the skeleton that protects the brain.
3. Suggest the three uses of the brain to particularly a P.4 child.
4. Outline atleast two ways Patrick can care for his brain.
5. Name atleast two drugs that are dangerous to the brain.

STOMACH

- i) It is part of the digestive system
- ii) It stores eaten food for some time.
- iii) The stomach also churns or mixes food to form chyme.
- iv) In the stomach, germs in the food are killed by hydrochloric acid produced by the walls of the stomach.
- v) Alcohol enters blood in the stomach.

Diagram showing the position of the stomach



ACTIVITY:

1. In which system of the body do we find the stomach?
2. Suggest two uses of the stomach to a person.

3. Name the stomach content that kills germs in the food one swallows.
4. Clearly define the term churning.

Uses of the stomach

- i) It stores food.
- ii) It digests food
- iii) It produces an acid which kills germs in the food.

Care for the stomach.

- i) Avoid drinking too much alcohol.
- ii) Drinking a lot of water to prevent constipation.
- iii) Eat a balanced diet
- iv) Avoid smoking.
- v) Avoid prolonged hunger.

Diseases of the stomach

- i) Ulcers
- ii) Diarrhea

Disorders of the stomach

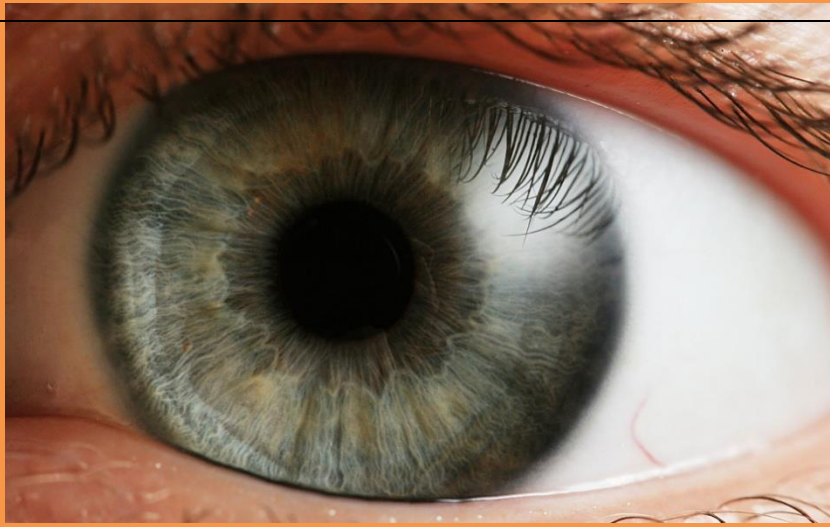
- i) Constipation
- ii) Indigestion
- iii) Vomiting
- iv) Choking

ACTIVITY;

1. Suggest two ways one can care for the stomach.
2. Name atleast two diseases of the stomach.
3. Identify three disorders of the stomach.
4. Why is a school student encouraged to drink a lot of water every after a meal?

THE EYES

- The eyes are found in the head.
- Eyes are protected by eye socket found in the skull.
- People have two eyes
- They are used for seeing.



Care for the eyes:

- i) Wash eyes with soap and clean water regularly.
- ii) Avoid looking at bright light directly.
- iii) Visit eye clinics for regular checkups and tests.
- iv) When reading or writing, do not hold your book too close or far from the eyes.
- v) Do not strain your eyes by reading in dim light, in a moving car, in direct sunlight, etc.

Diseases of the eyes.

- i) Trachoma
- ii) River blindness
- iii) Conjunctivitis
- iv) Night blindness.

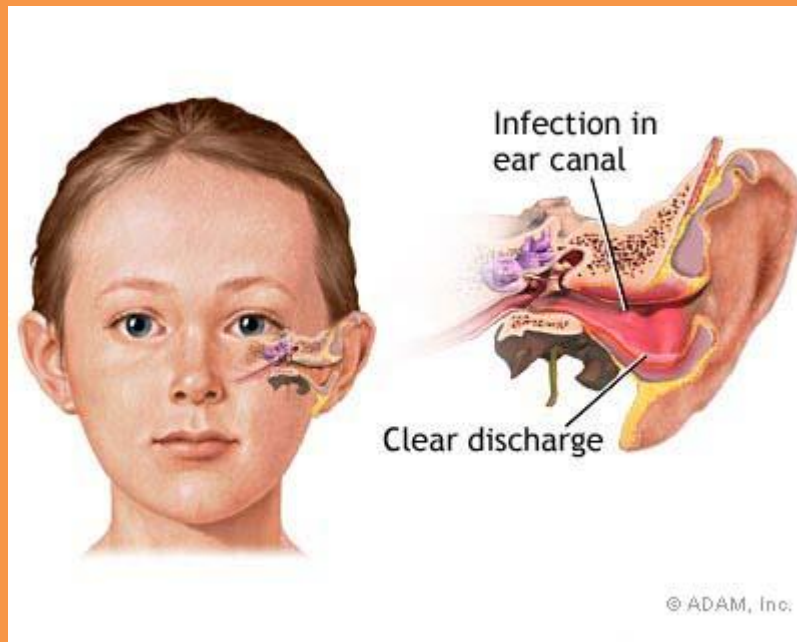
ACTIVITY

1. Name the part of the skeleton that protect the eyes.
2. Suggest two ways a student can care for the eyes.
3. Identify atleast two diseases of the eyes.
4. Of what use is the tear gland in the human eye.

EARS

- i) They are found on the head.
- ii) People have two ears at the sides of the head.

Diagram showing the position of the ear



Uses of the ears

- i) Ears are used for hearing.
- ii) For body balance.

Care for ears

- i) Wash your ears daily and keep them dry.
- ii) Do not put or push objects into your ears.
- iii) Do not use sharp objects for cleaning your ears.
- iv) Do not direct your ears to loud sound.

ACTIVITY

1. What is the position of the ears in a human body?
2. Suggest two uses of ears to a good listener?
3. Identity three ways to care for our ears.
4. Why is the ear referred as a sense organ?

THE LIVER

It is located in the upper part of the abdomen.

Uses of the liver

- i) Regulates blood sugar
- ii) Produces bile
- iii) Stores iron
- iv) Removes poisonous substances from the blood
- v) Stores Vitamin A and D

Care for the liver

- i) Avoid drinking too much alcohol
- ii) Have a balanced diet
- iii) Do regular body physical exercises.

Diseases of the liver

- i) Cirrhosis
- ii) Hepatitis B
- iii) Cancer of the liver

ACTIVITY

1. The liver is located in the upper part of the abdomen. Of what use is the liver in the body?
2. Outline two vitamins stored in the liver for use.
3. Cirrhosis attacks the liver. Name two other diseases of the liver.
4. Suggest two ways of care for the liver.

KIDNEYS

- i) They are found at the back of the abdominal cavity
- ii) There are two kidneys in the human body
- iii) They are protected by the pelvis

Use of the kidneys

They filter blood.

Care for the kidneys

- i) Regular physical exercise
- ii) Drink plenty of water
- iii) Avoid holding urine for a long time

Disease of kidneys

- i) Kidney stones
- ii) Bilharzias
- iii) Kidney failure

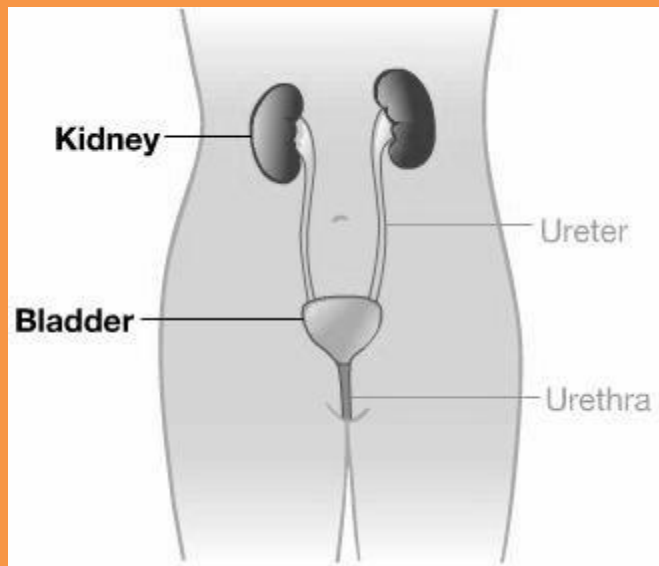
ACTIVITY;

1. Which part of the skeleton protects the kidney?
2. Give the use of the kidney in the body.
3. Suggest two ways of caring for the kidneys.
4. Mention one disease of the kidneys.

THE BLADDER (URINARY BLADDER)

i) It is found in the lower abdomen.

Diagram showing the position of the urinary bladder and the kidneys.



Use of the urinary bladder

i) It stores urine

Care for the urinary bladder

- i) Avoid drinking too much alcohol.
- ii) Do not keep urine for a long time in the bladder.
- iii) Drinking plenty of water.

The gall bladder

- i) It is found in the liver.
- ii) Its main work is to store bile.

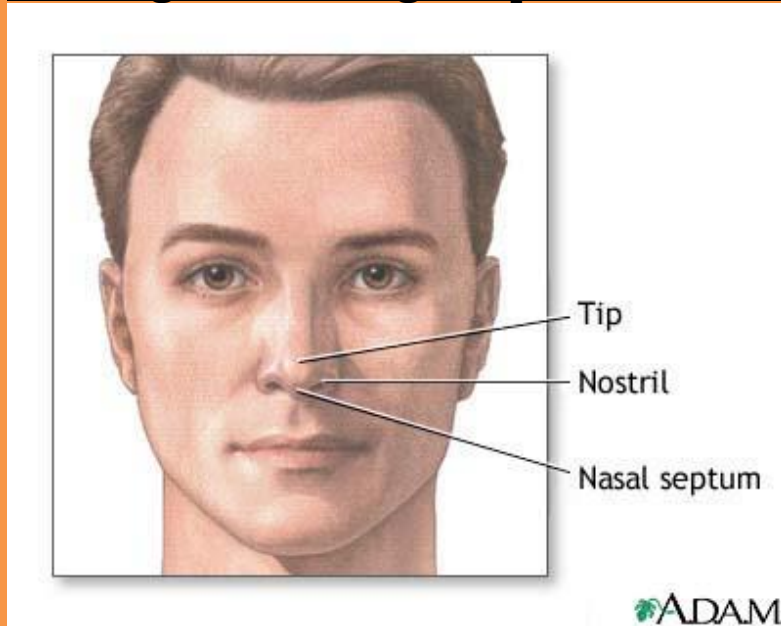
ACTIVITY

1. The urinary bladder of a human body is found in the lower abdomen. Of what use is the urinary bladder.
2. The main function of the gall bladder is to store the bile. In which organ the gall bladder found in the body.
3. The diagram below shows the position of body organs. Label parts K and L.

THE NOSE.

- The nose is found on the head
- A human being has one nose.
- The nose contains hair in it called cilia

The diagram showing the position of the nose.



Functions of the nose.

- The nose is used for smelling.
- The nose lets air in and out of the body.
- The cilia helps to trap the dust in the air we breathe in.
- The air is moisten in nose.

Disorders of the nose

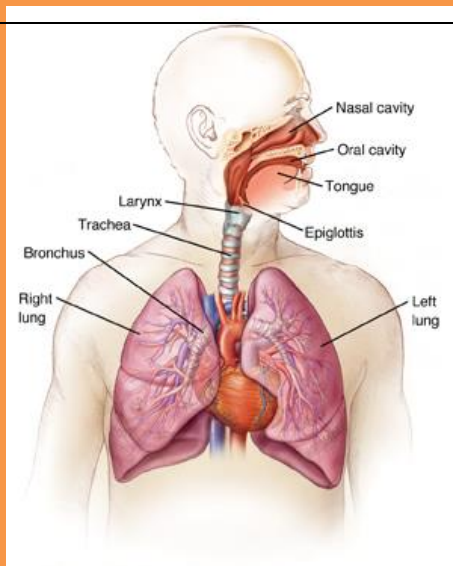
- Nose bleeding.
- Nose blockage by the mucus.

How to keep the nose healthy.

- By washing with clean water and soap.
- By cleaning using a clean piece of cloth
- Avoid rough games that might rapture the nose

THE LUNGS.

Diagram showing the position of lungs and the heart.



Use Of Lungs

- i) For breathing:
- ii) Take in oxygen
- iii) Take out carbon dioxide.

Care of the lungs

- i) Avoid tobacco smoking
- ii) Avoid dusty places
- iii) Avoid crowded places
- iv) Take infants for immunization to protect them against tuberculosis, whooping cough, etc.
- v) Do regular physical exercises.
- vi) Isolate people with diseases like tuberculosis.

Diseases of the lungs

- i) Tuberculosis.
- ii) Diphtheria
- iii) Whooping cough/ pertussis
- iv) Pneumonia
- v) Influenza
- vi) Chronic bronchitis

ACTIVITY

1. Name two body organs which are protected by the rib cage.
2. Outline two functions of the human lungs.
3. State the three common diseases of the lungs.
4. How can a P.4 child prevent the diseases of the lungs?

THE HEART

- i) The heart is situated in the chest cavity.
- ii) It is protected by the rib cage.
- iii) People have one heart.

Use of the heart.

- i) The heart is used for pumping blood throughout the body.

Care for the heart

- ii) Regular physical exercise.
- iii) Eating a balanced diet
- iv) Avoiding smoking.

Diseases of the heart

- i) Hypertension
- ii) Heart attack

ACTIVITY;

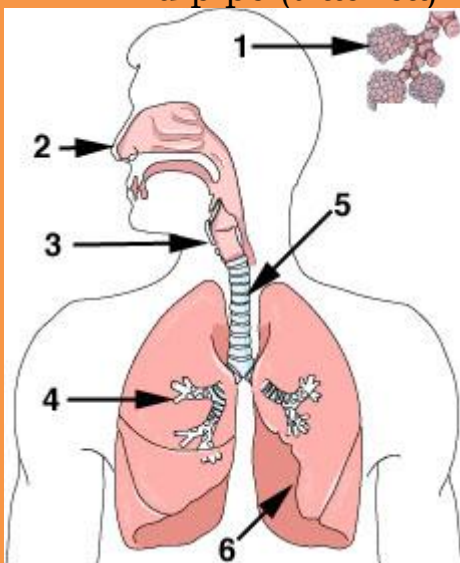
1. Which part of the body protects the heart
2. State the function of the heart in the body.
3. Suggest two ways of keeping the heart healthy.

RESPIRATION.

- Respiration is the way the body uses oxygen to break down food in order to produce energy.
- Oxygen is used for respiration
- Respiration takes place in the lungs.

Respiratory organs

- The lungs.
- The nose
- Wind pipe (trachea)



The process of respiration

- The air enters into the body through the nose.
- The air passes through the wind pipe to the lungs.
- In the lungs oxygen joins the blood stream
- The digested food in the stream is then broken down by the oxygen.

NB; Breathing is the movement of air in and out of the nose.

Importance of respiration.

- It provides energy to the body
- It helps to remove the waste carbon dioxide from the body.

BLOOD CIRCULATION

- Blood circulation is the movement of blood throughout the body.
- Blood moves through blood vessels in the body.

Organs of blood circulation.

- The heart
- The lungs
- The blood vessels

The process of blood circulation.

- The blood is pumped from the heart to the lungs to pick oxygen.
- The blood flows back to the heart
- The blood is then pumped to all other parts of the body through the blood vessels
- The blood without oxygen flows back to the heart.

Importance of blood circulation

- It transports food nutrients throughout the body.
- It transports waste products to their excretory organs.
- It helps to distributes heat in the body.

EXCRETION

THE SKIN

- i) It is found on the body surface
- ii) It has pores (small openings) on it.
- iii) It has hair on it.

Uses of the skin to people

- i) Protects the body against external injuries.
- ii) Protects the body against germs.
- iii) Used in the making of Vitamin D.
- iv) The skin regulates body temperature.

Care for the skin:

- i) Bathing daily to remove germs.
- ii) Do not play rough games that can lead to injury on the skin.
- iii) Put on clean clothes
- iv) Avoid sharing clothes with infected people.

Diseases of the skin:

- i) Scabies
- ii) Ring worm
- iii) Herpes-zoster
- iv) Athletes foot.

ACTIVITY;

1. Mention any two diseases of the kin
2. Suggest any two ways of caring for the skin.
3. Briefly explain the term excretion.
4. Give two uses of a skin.