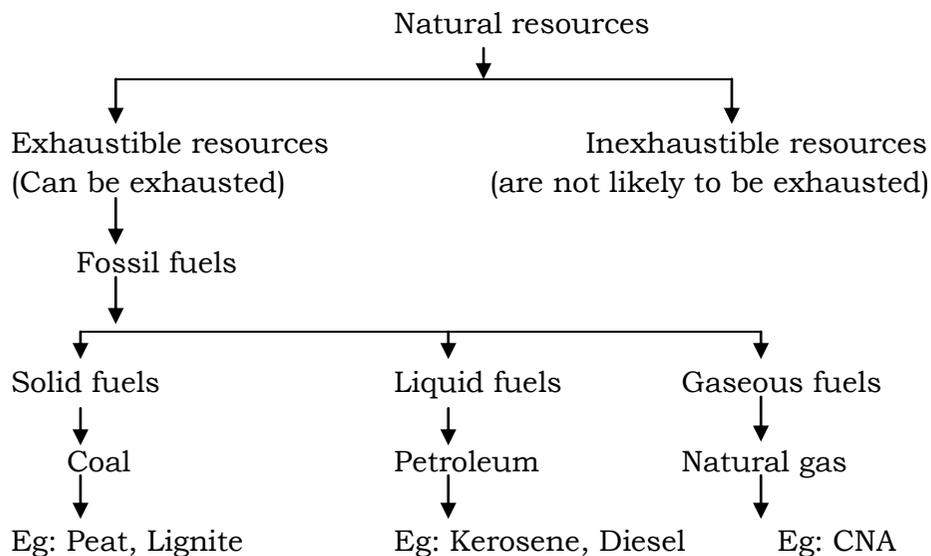


I. Introduction:



II. Definitions:

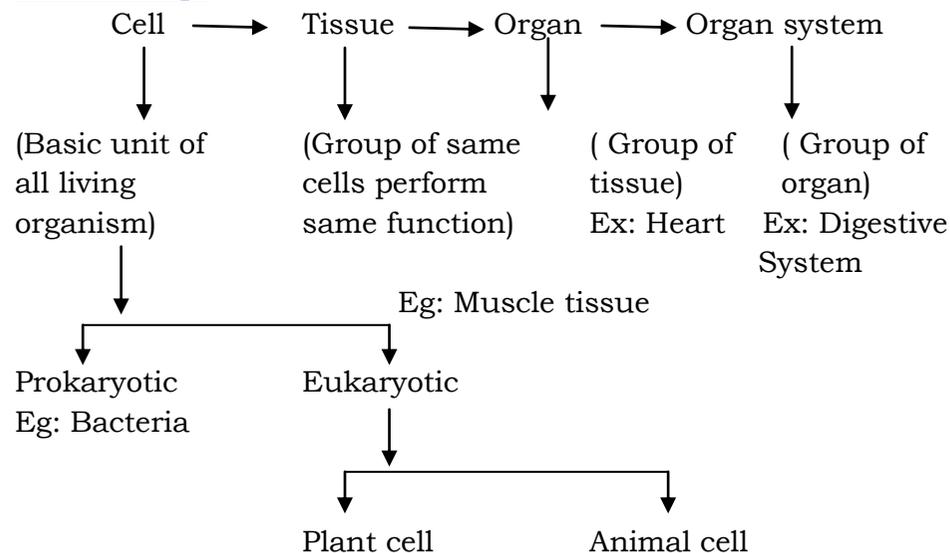
1. Natural resources: The materials obtained from nature
2. Exhaustible natural resources: The natural resources which can be exhausted as a result of human consumption.
3. Inexhaustible natural resources: The natural resources which are not likely to be exhausted due to human activities and are present in unlimited quantities.
4. Fossil fuels: The materials of biological origin occurring within the earth's crust which can be used as a source of energy.

III. Diagrammatic Representation.

1. Fractional distillation of petroleum.

Internet Online

I. Mind map:



II. Definitions:

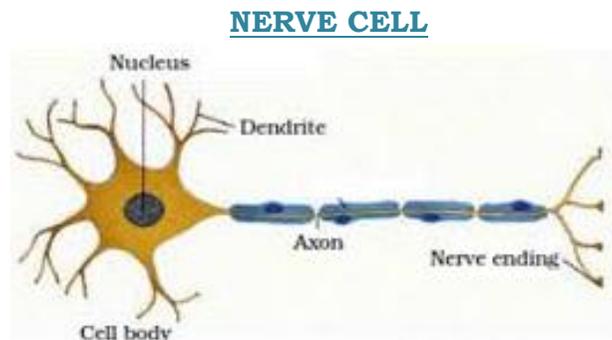
1. Cell: The basic unit of structure and function of an organism.
2. Tissue: A group of cells of the same size, shape and functions.
3. Organ: A structure that contains more than one type of tissue.
4. Organ system: A group of organs working together.
5. Unicellular organism: Organism consisting of single cell
6. Multicellular organism: Organism consisting of more than one cell.
7. Protoplasm: The living substance of a cell.
8. Cell membrane: A thin outer covering of a cell.
9. Cell wall: The additional covering layer around a cell membrane in a plant cell.
10. Cytoplasm: A jelly like fluid which occupies the space between the cell membrane and the nucleus.
11. Nucleus: A spherical structure present in the centre of the cell and is surrounded by the cytoplasm.
12. Chromosomes: Thread - like structures present inside the nucleus that carry a number of genes and help in the inheritance of characters from parents to their children.
13. Prokaryotic cell: A cell which lacks a nuclear membrane.
14. Eukaryotic cell: A cell having a well - organized nucleus with

a nuclear membrane.

III. Diagrammatic questions:

1. Make a sketch of the human nerve cell. What functions do nerve cells perform.

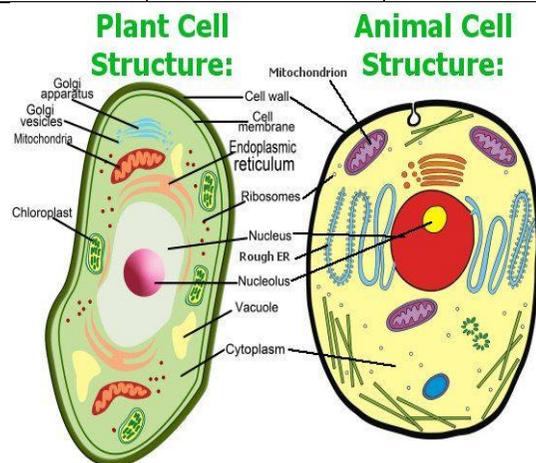
Ans: The nerve cell receives and transfers messages, thereby helping to control and coordinate the working of different parts of the body.



2. Make sketches of animal and plant cells and State three differences between them.

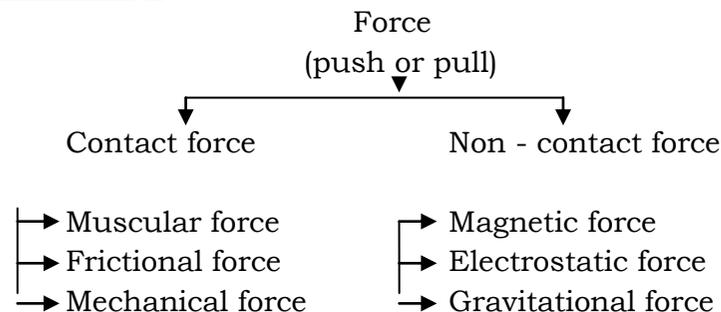
Ans:

S. No	Part	Plant cell	Animal cell
1	Cell wall	Present	Absent
2	Centrosomes	Absent	Present and helps in cell division
3	Plastids	Present	Absent
4	Vacuole	Large vacuole	Small vacuole or absent



CHAPTER: 11 - FORCE AND PRESSURE

I. Mind map:

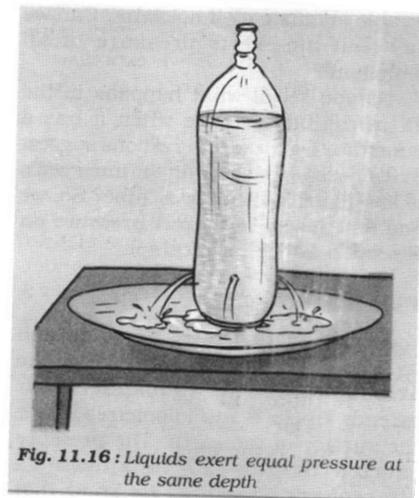


II. Definitions:

1. Force: A push or pull acting on a body which tends to change its state of rest or of motion.
2. Contact force: The forces in which the two interacting objects are in physical contact with each other.
3. Non - contact force: The forces which do not make a physical contact with the body and act through space.
4. Muscular force: The force entered by the muscles of our body.
5. Mechanical force: The force produced by a machine.
6. Magnetic force: The force exerted by a magnet.
7. Electrostatic force: The force exerted by a charged body on another charged or uncharged body.
8. Gravitational force: The force with which any two objects pull each other.
9. Friction: The force that opposes the motion of an object
10. Gravity: The force with which the earth attracts objects towards itself.
11. Pressure: The force acting on a unit area of a surface

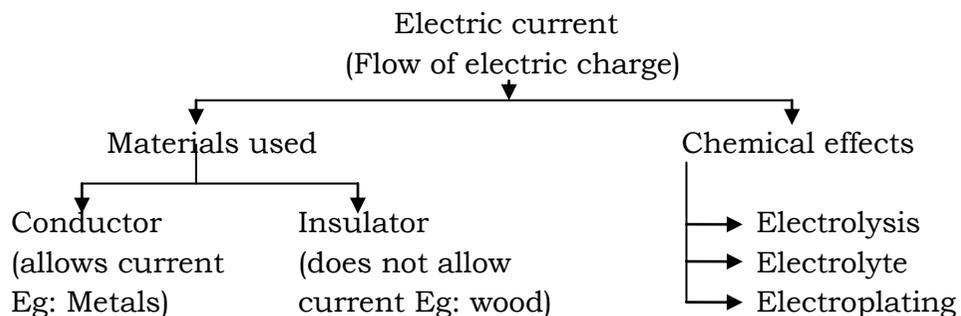
III. Diagrammatic Representation:

1. Liquid exerts pressure:



CHAPTER -14: CHEMICAL EFFECTS OF ELECTRICAL CURRENT

I. Introduction:



II. Definitions:

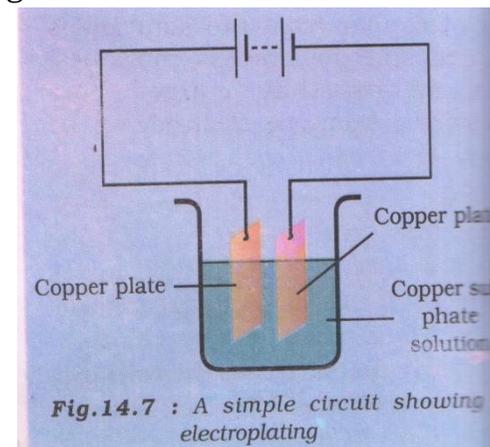
1. Electricity: The movement of charges through a body
2. Electric current: The flow of electric charge
3. Conductors: Materials which allow electric current to flow through them
4. Insulators: Materials which do not allow electric current to flow through them.
5. Electrolyte: The liquid which conducts electricity and undergoes decomposition.

6. Ion: An atom or a molecule with an electric charge created by losing or gaining one or more electrons.

7. Electrolysis: The process of decomposition of an electrolyte solution into ions on passing an electric current through it.

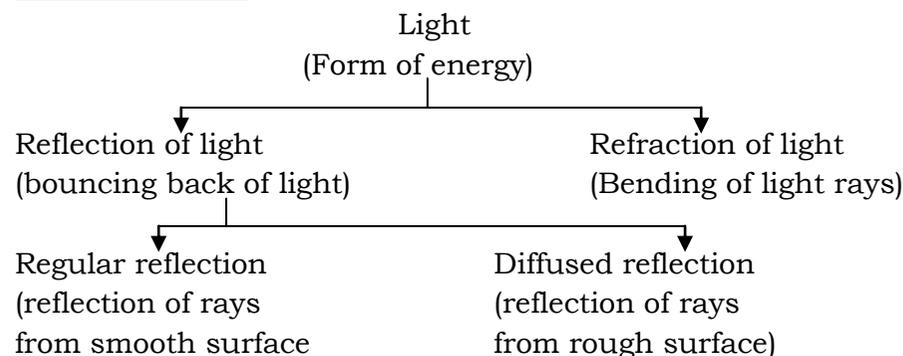
II. Diagrammatic Representation:

1. Electroplating



CHAPTER - 16: LIGHT

1. Introduction:



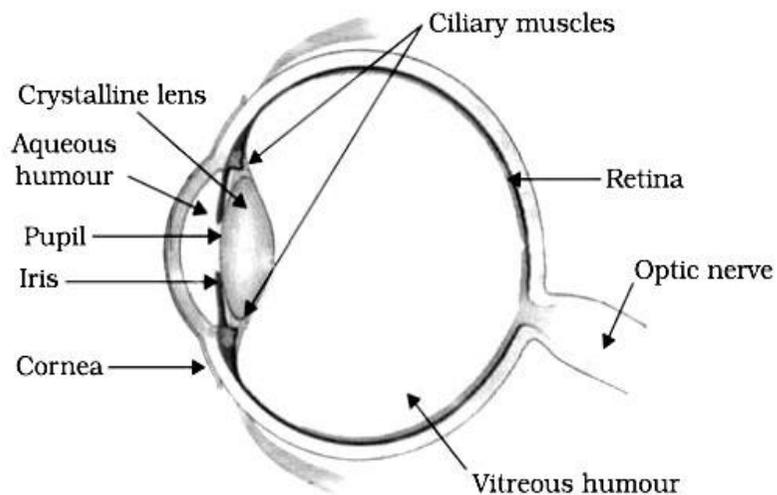
II. Definitions:

1. Light: A form of energy which gives us the sensation of seeing objects.
2. Reflection of light: The phenomenon of bouncing back of light from the surface of an object.
3. Normal Ray: A line perpendicular to the surface of the mirror at the point of incidence.
4. Incident ray: The ray of light coming from an object that falls on the surface of the mirror.

5. Reflected ray: The ray of light that gets reflected from the mirror.
6. Angle of incidence: The angle formed by the incident ray with the normal.
7. Angle of reflection: The angle formed between reflected ray and the normal.
8. Beam of light: A group of light rays coming from the same source in the same direction.
9. Multiple reflection: The phenomenon in which we get multiple images of an object.
10. Dispersion of light: The phenomenon of splitting of white light into its component colours.
11. Spectrum of white light: A set of colours formed on splitting of white light.
12. Persistence of vision: The ability of an eye to continue to see an image after the object is removed.
13. Near point of eye: The least distance at which a normal eye can see an object clearly.

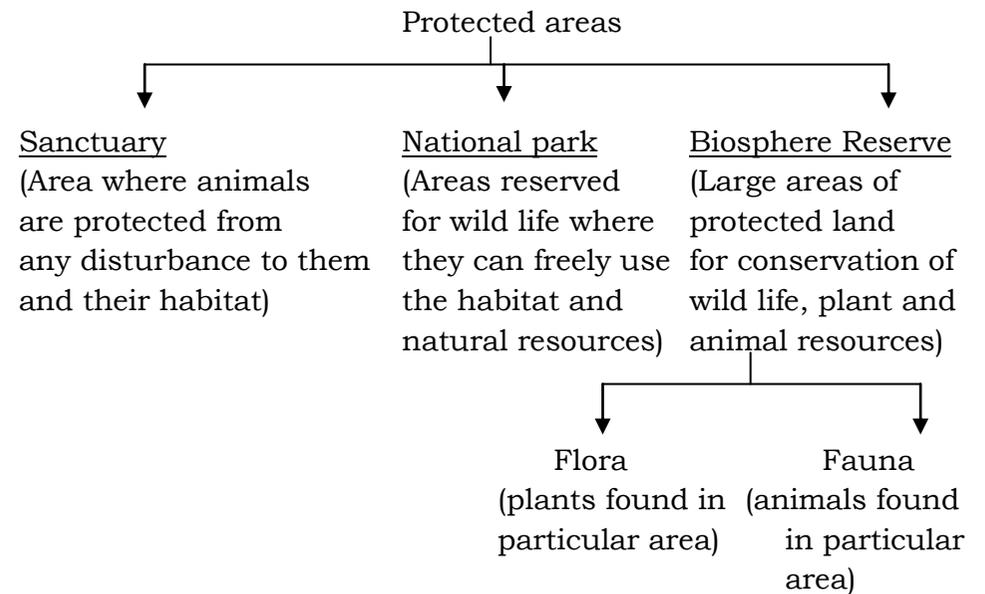
II. Diagrammatic Representation

1. Draw a labelled sketch of the human eye.



CHAPTER-7 CONSERVATION OF PLANTS AND ANIMALS

I. Introduction:

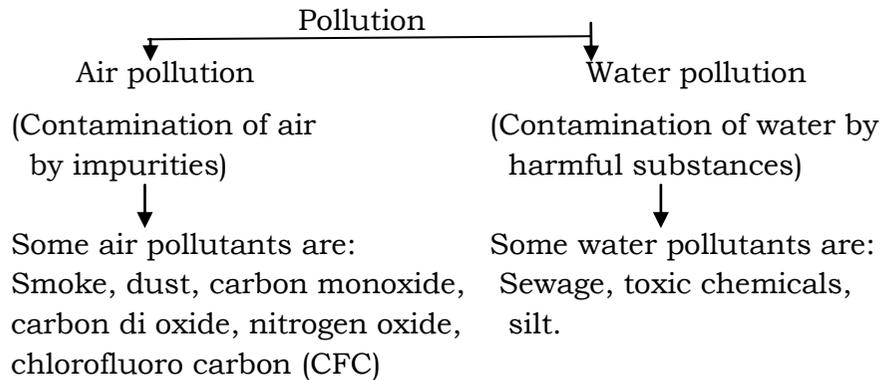


II. Definition:

- 1) Desertification: The process of conversion of a fertile land into a desert.
- 2) Bio-sphere: The part of the earth which supports life or where living organisms exist.
- 3) Red data Book: It is source book which contains a record of endangered plants and animals.
- 4) Bio-sphere Reserve: A large multipurpose protected area for conservation of wildlife, plant and animal resource.
- 5) Extinct species: The species of plants and animals which have been lost forever.
- 6) Endangered species: The species which are at high risk of becoming extinct.
- 7) Endemic species: Species of plants and animals which are found exclusively in particular area and nowhere else in the world.

CHAPTER-18. POLLUTION OF AIR AND WATER

I. Introduction:

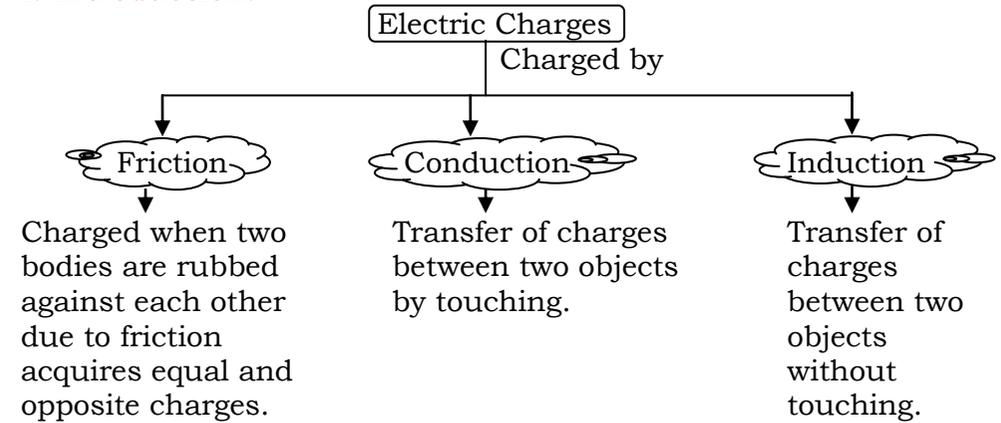


II. Definition:

- 1) Air pollution : Contamination of air with smoke, dust and harmful gases.
- 2) Water pollution: The contamination of water with unwanted and harmful substances.
- 3) Potable water : The water which is purified and fit for drinking.
- 4) Global warming : The increase in average temperature of the earth in atmosphere that causes corresponding changes in climate.
- 5) Green house effect: The phenomenon of trapping of the sun's radiation by the gases present in the earth's atmosphere.

CH.15 SOME NATURAL PHENOMENA

I. Introduction:



II. Definition:

1. Charged objects: When the objects acquire charges, they are called as charged objects.
2. Electroscope: A device which is used to test whether an object is carrying charge or not.
3. Earthing: The process of transferring of charge from a charged object to the earth is called earthing.
4. Seismic or Fault zones: The weak zones where earthquakes are more likely to occur are known as seismic or fault zones.
5. Richter scale: It is the scale where the power of an earthquake is expressed in terms of a magnitude.
6. Seismograph: An instrument where the seismic waves are recorded.

III. Diagrammatic Representation:

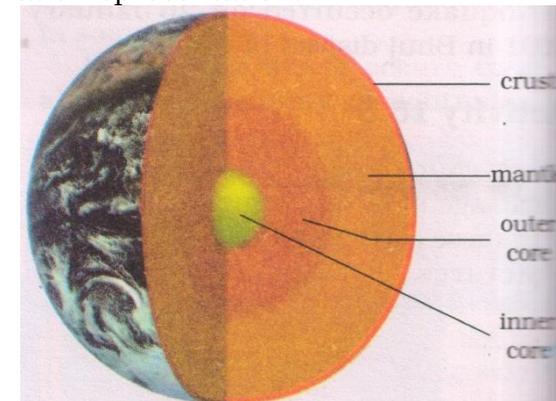
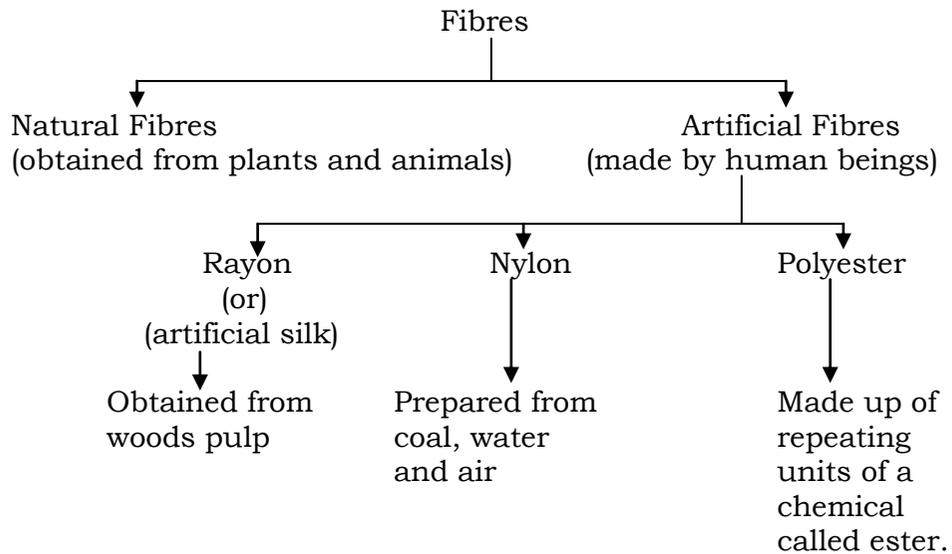


Fig. 15.9 : Structure of the earth

CH.3 SYNTHETIC FIBRES AND PLASTICS

I. Introduction:



II. Definitions:

1. Polymer: Many smaller units combine to form a large single unit which is called a polymer.
2. Polymerization: The process of combining monomer units into a larger polymer.
3. Thermoplastics: Plastics which melt or become soft on heating and harden when cooled.
4. Thermosetting plastics: Plastics which when moulded once, cannot be softened on heating.
5. Bio-degradable: A material which gets decomposed through natural processes, such as action by bacteria, is called bio-degradable.
6. Non-biodegradable: A material which is not easily decomposed by natural process is termed non-biodegradable.
7. 4R Principle: Reduce, Reuse, Recycle and Recover.