

# Science

Young children have keen minds but their attention span is very short. So it is very important for the teacher to make science interesting so that they grasp well. Keeping this in mind our Science book is more activity oriented and gives importance to 'learning by doing'.

So the teacher has to involve the child in every step and make sure that the concept is made very clear.

By taking the children for nature walks and by talking to them, and by involving them in group work, discussions etc. the teacher can make learning, fun.

We have provided notes to teachers in the text book which will help the teacher make Science simple and at the same time very interesting to the children.

## Living Things

### Exercise

Fill in the blanks choosing the correct answer:

- a) Fish moves with the help of fins.
- b) Birds fly with the help of wings.
- c) Plants make their own food in green leaf.
- d) Kittens grow into cat.
- e) Frog breathes through lungs.

Write these sentences in the correct order.

A seed is in the ground

A small plant grows

A bud grows on the plant

A flower comes out

The flower dies

Match the following:

cow- grass, hen-eggs, lizard-mosquito, mango-tree, tadpole-frog.

Answer the following:

- a) Tree is a living thing. Why?

A tree is a living thing because it grows, needs food and water, it breathes, it reproduces and dies.

- b) How do plants breathe?

Plants breathe through small pores in their leaves called stomata.

- c) How do birds reproduce?

Birds reproduce by laying eggs.

### Worksheet (Workbook)

Write 'True' or 'False':

- a. True    b. False    c. False    d. True    e. True

Match the following:

- A.    a. stomata                      b. gills
- c. swims in water and jumps on land
- d. crawls                      e. grass/carrot

Fill in the blanks using the words given below:

- a. green leaves    b. gills    c. tadpole    d. lungs    e. eggs

Answer the following:

- A. Write five characters of living things:

- 1. they breathe    2. they move    3. they need food
- 4. they reproduce    5. they die

- B. How do these reproduce ?

- 1. eggs                      2. eggs
- 3. giving birth to live young ones
- 4. by dropping seed                      5. eggs

Drawing activity.

What do they eat ?

- A. Lion - flesh of other animals
- Frogs - insects,    Birds - fruits, worms
- Cow - grass / plants
- Plants - make their own food

## Plant Life

### Exercise

Fill in the blanks.

- Plants need water, air and sunlight to grow.
- Tall and strong plants with trunk are called trees.
- Rose plant is a shrub.
- Herbs have soft stem.
- Plants with weak stem are climbers.

Name one plant each that grows in these places.

- Cold places Pine tree.
- Hot places near sea Coconut tree.
- In water Lotus.
- In desert Cactus.

### Worksheet (Workbook)

Use these words to fill in the blanks:

- a. trees      b. creepers      c. cold      d. cactus  
e. few months

Join the name of the plant to the word which shows what kind of plant it is:

- Grape-vine- climber
- Mango - tree
- Tulsi - herb
- Rose - shrub

Name two trees, two shrubs, two herbs and two climbers other than those given in the text.

- |             |   |                |                  |
|-------------|---|----------------|------------------|
| a. trees    | : | 1. oak         | 2. willow        |
| b. shrubs   | : | 1. tea         | 2. bougainvillea |
| c. herbs    | : | 1. coriander   | 2. mint          |
| d. climbers | : | 1. bittergourd | 2. snakegourd    |

Answer the following questions:

- Some plants like creepers or climbers have a weak stem. They cannot stand erect. So they need the support of walls or tree trunks.

- Mint is a small plant with a soft stem. Mint lives only for a few months. So we call mint a herb.
- Give 2 characters of:
  - Trees : a) Tall and strong, b) Usually have a trunk and many branches.
  - Shrubs: a) Small plants with hard stems, b) They live for many years.
  - Herbs: a) Small and have weak stem, b) They live for a few months.
  - Climbers: a) They have a weak stem, b) They need the support of walls or tree trunks.

### Uses of Plants

#### Exercise

Name three things we can make from

Wood - chair, pencil, table

Rubber - eraser, tyre, ball

Fibre - thread, cloth, door mats.

Name one plant each that gives us these -

- cooking oil - sunflower
- fibre for sacks - coconut tree
- perfume - rose
- medicine - mint
- paper - bamboo

Which parts of these plants do we eat?

- Tomato - fruit
- Cabbage - leaf
- Carrot - root
- Peas - seed
- Potato - stem

Put the things in the correct list.

From plants - coir mat, wooden chair, cotton towel, lime juice, sugar, newspaper.

Not from plants - salt, nylon bag, milk, glasses, gold bangle.  
 Puzzle - In the word search there are some things we get from plants. Find them and write their names in the correct boxes.

<u>Seeds</u>	<u>Roots</u>	<u>Fruits</u>	<u>Leaf</u>	<u>Stem</u>
Peas	Beetroot	Orange	Cabbage	Potato
Rice	Carrot	Tomato	Spinach	Sugar
Bean	Radish	Apple	Lettuce	

**Worksheet (Workbook)**

Fill in the blanks:

- a. radish and carrot                      b. potato and sugarcane
- c. spinach and lettuce                      d. apple and tomato
- e. peas and beans

State whether the following statements are true or false.

- a. true    b. false    c. true    d. false    e. true

Match the following:

- a. paper    b. dead leaves    c. tyre    d. rose
- e. medicines

Answer the following:

1. a. Plants give us food.  
    b. They purify the air and keep it fresh.  
    c. They also give many useful things like fibre, wood, rubber, paper, etc.
2. a. coir mat, bags, carpets  
    b. furniture, bats, door-window frames.

Underline the correct word / words:

- a. trees                      b. not possible    c. Paper
- d. clean                      e. coffee

**Animal Life**

**Exercise**

Fill in the blanks.

- 1) We get meat from goat.

- 2) A bird lays eggs.
- 3) We get wool from sheep.
- 4) A dog is kept as a pet. It guards our house.
- 5) We get leather from buffalo.

Match the following.

- a - 3,            b -4,            c - 1,            d - 2

Name the following.

- a) Two wild animals.    - Lion, Tiger
- b) Two domestic animals.    - Camel, Cow
- c) Two animals that eat only flesh.    - Wolf, leopard
- d) Two animals that eat only plants.    - Goat, Giraffe
- e) Two animals that eat both plants and flesh.    - Bear, Crow
- f) Two animals that eat flesh of dead animals.    - Vulture, Jackal

**Worksheet (Workbook)**

Fill in the blanks:

- a. plant, hoofs                      b. crow                      c. wild                      d. dogs

Name two animals in each case:

- a. cow, goat                      b. hen, duck                      c. sheep, cattle
- d. cattle, camel                      e. dogs, cats

Match the following:

- 1. c. have sharp claws and sharp pointed teeth
- 2. a. eat both plants and flesh of animals
- 3. d. carry load                      4. b. catch mice.

Answer the following:

1. Animals that live in forest are wild animals.  
 Examples are -                      lion, bear.
2. Bear and crow eat both plants and flesh.
3. Vultures and hyenas eat flesh of dead animals. By doing this, they keep the forest clean.
  - a. 1. Their teeth are flat and sharp.
  - 2. They do not have claws, instead they have hoofs.
  - b. 1. They have sharp claws.

2.They have sharp pointed teeth.

## Birds

### Exercise

Fill in the blanks.

- The bird's body is covered with feathers.
- All birds lay eggs.
- The baby birds when hatched cannot see and have no feathers.
- Birds fly with the help of wings.

Where do birds build their nests?

Birds build their nests in trees or on the ground or in buildings.

Choose the correct answer.

- Kiwi cannot fly.
- Nests are used to lay eggs.
- Beak helps to eat.
- Feathers keep the body warm.
- Chicks are baby birds.
- Birds do not have teeth.

Give the uses of :

Beak to eat food

Feathers to keep body warm and also to fly

Wings to fly

Nest to protect the eggs and to keep them warm.

Join the dots, colour and label the parts.

beak, eye, wings, feather, leg

### Worksheet (Workbook)

Fill in the blanks:

- |               |          |         |
|---------------|----------|---------|
| a. feathers   | b. wings | c. beak |
| d. some birds | e. All   |         |

Match the following:

- |   |               |                       |
|---|---------------|-----------------------|
| A | 1. baby birds | 2. do not have teeth. |
|---|---------------|-----------------------|

3. are used to lay eggs.

4. cannot fly

5. keep the body warm.

Mark these sentences ✓ or X

- |      |      |      |      |
|------|------|------|------|
| a. X | b. X | c. ✓ | d. X |
|------|------|------|------|

Label the parts.

eye, wings, feathers, beak, legs.

## Fishes And Other Water Animals

### Exercise

Fill in the blanks.

- Baby fish are called fry .
- Fish breathe through gills .
- Fish's body is covered with scales .

Colour - starfish, whale, crab, octopus.

Match the following:

- |        |   |                             |    |         |
|--------|---|-----------------------------|----|---------|
| fish   | - | young ones                  | —> | fry     |
| frog   | - | young ones                  | —> | tadpole |
| fins   | - | help fish to swim           |    |         |
| gills  | - | help fish to breathe        |    |         |
| scales | - | cover the body of the fish. |    |         |

### Worksheet (Workbook)

Name these animals: Are they fish ? Write Yes/No in the box.

Octopus (No), Starfish (No), Dolphin (No), Whale (No)

Label the parts:

eye, gills, fins, scales, tail fin.

Fill in the blanks:

- |           |        |          |        |         |
|-----------|--------|----------|--------|---------|
| a. scales | b. fin | c. gills | d. fry | e. eggs |
|-----------|--------|----------|--------|---------|

## The Human Body

### Exercise

Match the following:

- |        |   |     |
|--------|---|-----|
| a) See | - | Eye |
|--------|---|-----|

- b) Smell - Nose
- c) Taste - Tongue
- d) Feel - Hand
- e) Hear - Ear

Write true (✓) or false (x) and write the correct answer if false:

Correct answer - Sugar tastes sweet

Correct answer - We see with our eyes

✓ We feel with our skin.

See the picture and fill in the blanks:

- a) Tina sees with her eyes .
- b) She can smell the flower with her nose .
- c) She can hear the cat mewing.
- d) List the things that Tina can see.

chair, table, cat, books, picture on wall, clock, flower vase.

### Worksheet (Workbook)

Match the following:

A. 1. sweet 2. sour 3. cold 4. hot 5. see

Parts of a body. Label the parts.

eye, nose, shoulder, chest, wrist, fingers, knee, ankle, head, ear, mouth, neck, elbow, hand, thigh, leg, toes.

Fill in the blanks:

a. touching b. tongue c. smell d. ears f. eyes

Answer the following:

- a. sight, hearing, smell, taste and touch are our five senses.
- b. eyes, ears, nose, tongue and skin are our five sense organs.
- c. good smell: perfume, rose  
unpleasant smell: rotten fish, garbage can

Match the following:

sweet - chocolate, bitter - bittergourd, salty - salt, sour- lemon

## Matter

### Exercise

Put these things into the correct group:

Natural things - Sun, Moon, Clouds, Rocks

Man-made things - Towel, Bag, Book, Pot

Answer the following:

a) Name two things made from animal skins.

Leather handbag, fur cap

b) Name two natural things.

Rock, Sand

c) Name two things made from metals.

Gold-Bangle, Silver-Pot.

d) What are the three forms of matter?

Solid, liquid and gas are the three forms of matter.

Put these into the correct group.

Solid - pen, book, mango, stone

Liquid - milk, oil, juice, petrol

State whether these sentences are true or false.

a) False b) True c) False d) True

### Worksheet (Workbook)

Fill in the blanks:

a. natural, man-made

b. matter

c. solids

d. liquids

State 'True' or 'False': If false write the correct statement.

a. False. Solids have a definite shape.

b. False. Watch is a non-living thing,

c. False. Plants are living d. true e. true

A. Put these into the correct group.

Natural things: stars, plants, rocks, water, air.

Manmade things: glass, bucket, balloon, kite, pencil

B. Solid: stone, car, leaf, sugar, table

Liquid: water, oil, blood, petrol, milk

Answer the following:

1. a. solid                      b. liquid                      c. gas
2. a. Solid - have a definite shape  
b. Liquid - flow freely, has no definite shape  
c. Gas - is very light, has no definite shape.

**Air**

**Exercise**

Answer the following.

- a) Give two uses of air.  
All living things need air to live. Air is also needed for burning.
- b) Name four things that air has.  
Air has water, dust, smoke and germs in it.
- c) Why is there no life on moon?  
There is no air on moon, so there is no life there.
- d) What makes air impure? How can it be purified?  
The dust and smoke make air impure. By planting trees air can be purified.

**Worksheet (Workbook)**

Fill in the blanks:

- a. wind                      b. carbon dioxide                      c. water vapour
- d. air                      e. moon

Write 'True' or 'False':

- a. true      b. false      c. false      d. true      e. true

Match the following:

1. when water boils                      2. for breathing
3. plants make food                      4. impure air
5. moving air

Answer the following:

1. a. The dust in the air makes it impure.  
b. The smoke from factories and vehicles makes air impure.

2. a. By planting trees air can be purified.
3. a. Air contains water in the form of water vapour.  
b. Air has dust, smoke and also germs.
4. a. All living things need air to live  
b. Air is also needed for burning

**Water**

**Exercise**

Answer the following:

- a. Name the three main sources of water.  
Rain, rivers, seas and oceans are the main sources of water.
- b. Give three main uses of water.  
We use water for drinking, bathing and washing clothes and vessels.
- c. Give two ways by which water gets polluted.  
1) The rain collects dust and germs from the air.  
2) Waste from factories and homes are thrown into the river.
- d. Why should we use boiled water for drinking?  
When we boil water, the germs in the water get killed and the water becomes safe to drink.

**Worksheet (Workbook)**

Fill in the blanks:

- a. dirty water                      b. filtering, boiling                      c. rain
- d. water                      e. river                      f. plants, animals

Match the following:

1. well    2. bathing    3. kills germs    4. dirty water    5. roots

Answer the following:

- a. 1. The rain collects dust and germs from the air.  
This rain water collect in rivers, lakes, etc.  
2. Waste from factories and homes are thrown into the rivers and seas.
- b. 1. boiling                      2. filtering

- c. 1. drinking    2. bathing  
d. 1. rain        2. well

Underline the correct word/words:

- a. water    b. water    c. blue    d. rivers

### The Earth, Moon, Sun and Other Stars

#### Exercise

State true or false.

- a) False    b) True        c) False  
d) True    e) False

Answer the questions in one word.

- a. What is the shape of the moon ? Round.  
b. What shape is the earth ? Round  
c. Does the moon give out its own light?    No.  
d. Earth, Sun and Moon - of these three  
1) Which is the biggest?  
Sun  
2) Which is the smallest?  
Moon

Answer the following.

- a. In which direction does the earth spin?  
The earth spins from west to east.  
b. Why is there no life on moon?  
There is no air on moon, so there is no life on moon.  
c. Write two sentences about the sun.  
The sun is a very bright star. It is made up of hot burning gases.  
d. How long does earth take to-  
1) spin round once?  
One day  
2) go round the sun once?  
One year / 365 days

### Worksheet (Workbook)

Fill in the blanks:

- a. moon            b. west to east            c. 365 days  
d. planet            e. sun

Match the following:

1. takes 28 days to go round the earth  
2. is made up of hot burning gases  
3. takes 1 day to spin round once    4. earth    5. moon

Answer the following:

- a. 1. a) The sun is a star,  
b) It is made up of hot burning gases  
2. a) goes round the earth,  
b) there is no life on moon  
3. a) is a planet, b) the earth goes round the sun

Choose the correct answer and write below:

- a) 1) because earth spins round from west to east.  
b) 1) day  
c) 2) earth going round the sun