

UNIT

1

# SCIENTIFIC SKILLS

Look at the picture. Talk about it.





# Science Process Skills

## Observing

We observe using our senses.

What are the senses used to observe?



Sense of touch



Sense of sight



Sense of smell



Sense of taste

Tik!  
Tik!  
Tik!



Sense of hearing

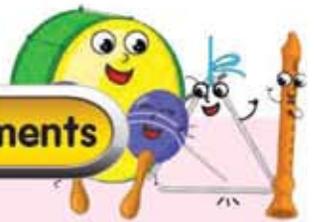
### Teacher's Info

- Apply the brainstorming method to get the pupils' responses.
- Discuss every response from the pupils on observing skills.



# Let's Test

# Observing Musical Instruments



## APPARATUS AND MATERIALS



A



B



C



D



E



## INDIVIDUAL ACTIVITY

### Steps

- 1 Ask your friend to close his eyes.



### CAUTION!

Ensure that the pupil does not play the musical instrument close to the ear during the activity.

- 2 Choose one musical instrument and play it.
- 3 Ask your friend to open his eyes and choose the musical instrument that you have played.
- 4 Record your observation in a table as shown below.

Musical instrument played	Musical instrument chosen	Right (✓)/Wrong (X)
A		
B		

## QUESTIONS

1. Can you guess all the musical instruments played?
2. What is the sense that helps you to guess the sound of the musical instrument?



### Teacher's Info

- Other musical instruments can also be used in the above activity.

## Communicating

Communicating is the way we deliver information to other people.

Let us look at the way Alia communicates with her friend about a ladybird.



Oral

A ladybird is red with black spots on the wings.



Sketch



Writing





## Creating

## Constructing a Sheep Model



### APPARATUS AND MATERIALS



cauliflower



grapes



### CAUTION!



toothpicks



a picture of a sheep



### GROUP ACTIVITY

#### Steps

- 1 Observe the picture of a sheep.
- 2 Construct a model of a sheep using the materials above.



- a** Pierce a toothpick into a cauliflower.



- b** Stick grapes to make the head and legs.

- 3 Talk about the model you have constructed.



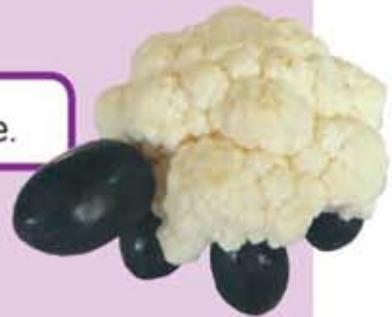
### HOTS

Compare the sheep model to the sheep in the picture.



### QUESTION

What other communication methods can you use?



1.1.2

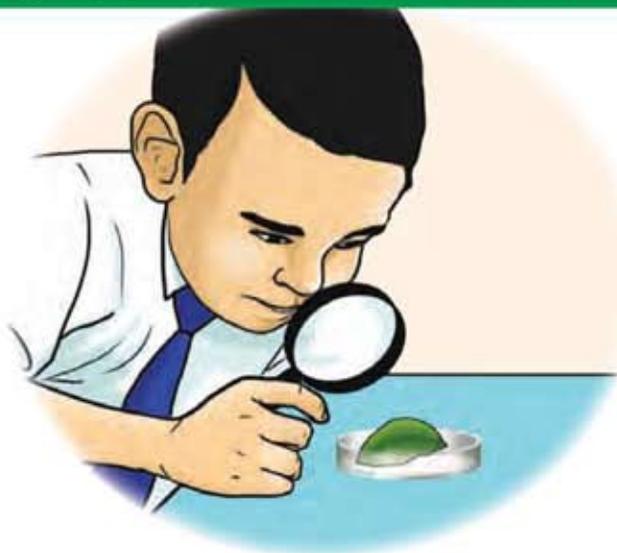




# Manipulative Skills

Manipulative skill is a psychomotor skill used during science investigation.

## Using apparatus and science materials



## Handling specimen



## Sketching



1.2.1
1.2.2
1.2.3
1.2.4
1.2.5

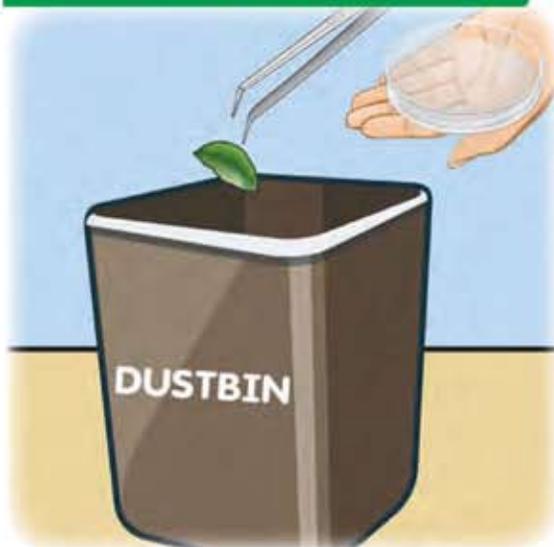


### Teacher's Info

- Specimen is a material or an object to be tested.
- Psychomotor is a skill related to body movement and mental activity.

Activity Book  
Pages:  
7-10

## Cleaning apparatus



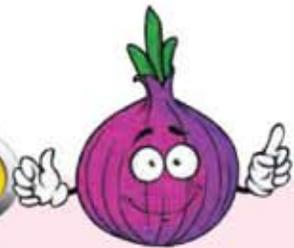
## Storing apparatus





## Let's Test

## What a Nice Onion!



### APPARATUS AND MATERIALS



red onions



cutter



magnifying glass



### GROUP ACTIVITY

#### Steps



- 1 Cut the onion into two.
- 2 Observe the onion with a magnifying glass.
- 3 Sketch the pattern of the onion.
- 4 Clean up and store the apparatus used.

### ? QUESTION

Why should the apparatus be cleaned and stored?

- 1.2.1
- 1.2.2
- 1.2.3
- 1.2.4
- 1.2.5



#### Teacher's Info

- Monitor the pupils while they cut the onion.



## Let's Revise



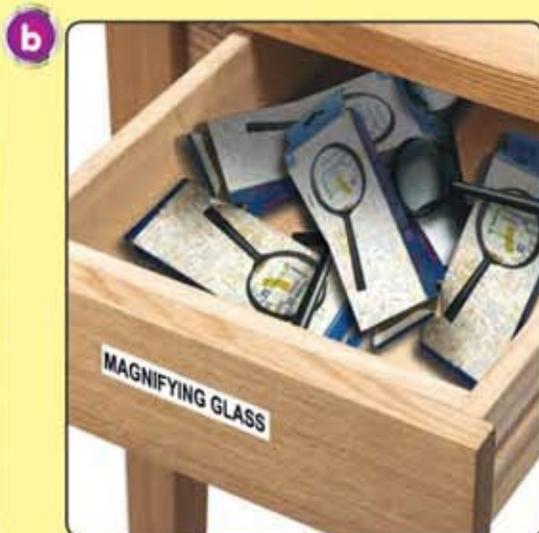
1. Observe the cat. Complete the sentences below.

- a A cat has four \_\_\_\_\_.
- b The cat's fine hair is \_\_\_\_\_.
- c The cat's claws are \_\_\_\_\_.

2. What are the senses that can be used to observe?

3. State two ways we can communicate.

4. Choose the correct way of storing magnifying glass.



### Teacher's Info

- The soft, fine hair found on many non-human mammals is typically called fur.



## Recall

- Science Process Skills
  - observing
  - communicating
  - Observing using the senses
    - sight
    - taste
    - hearing
    - smell
    - touch
  - Communicating
    - oral
    - writing
    - sketch
- Manipulative skills
  - using and handling science apparatus and materials correctly
  - handling specimens correctly and carefully
  - sketching specimens, materials and science apparatus correctly
  - cleaning science apparatus correctly
  - storing science apparatus and materials correctly and safely



## Science Recreation

### Field Study

1. Take one leaf.
2. Observe the leaf using a magnifying glass.
3. Sketch the shape of the leaf.
4. Take a leaf of a different shape and repeat steps 1 to 3.

