

# Natural Disasters

## SPECIFIC OBJECTIVES

- The students learn about
- ❖ natural disasters their occurrence and effects
  - ❖ earthquakes, their occurrence, measurement and damages caused by them
  - ❖ volcanoes, their types and effects
  - ❖ tsunami, floods and droughts, their occurrence and effects

### TEACHING AIDS

Pictures of damages caused by an earthquake, tsunami, flood and drought; pictures/animation on occurring of an earthquake, tsunami, flood, drought and eruption of a volcano; picture/animation of a seismograph and its working

### LESSON PLAN

- ❖ Teacher will start the chapter by giving a brief idea on natural disasters and ask students some general questions about them.
- ❖ Now, teacher will explain the occurrence and results of some natural disasters.
  - **Earthquakes**
    - ❑ With the help of teaching aids, teacher will explain what an earthquake is, why and how it occurs and the damages it causes.
    - ❑ Teacher will discuss about the scale and instrument for measuring an earthquake.
    - ❑ Teacher will also explain the terms 'seismology' and 'seismologists'.
  - **Volcanoes:** With the help of teaching aids, teacher will define a volcano, its vent, magma and lava. Teacher will also discuss its types.
- ❖ Teacher will ask students to solve 'Checkpoint 1'.
  - **Tsunami:** With the help of teaching aids, teacher will define tsunami, its causes and damages.
  - **Floods:** Teacher will define waterlogging and flood, and will discuss their causes.
    - ❑ With the help of teaching aids, teacher will discuss the damages caused by flood and the ways to prevent them.

- **Droughts:** Teacher will define drought and discuss its causes.
  - With the help of teaching aids, teacher will discuss the damages caused by drought, and the ways to prevent drought.
- ❖ Now, to check the understanding of students about the chapter, teacher will ask them to solve the 'Checkpoint 2'.
- ❖ At last, teacher will make students revise the new terms given in 'Science Vocabulary' and sum up the lesson by going through the points given in 'Wrapping it up'.
- ❖ Now, teacher will help students to solve the questions given in 'Exercises'.

### BOOST UP

- ❖ Teacher should discuss the conversation of Annu and Mannu given in bubbles in between the topics.
- ❖ Teacher should discuss the information given in the 'Knowledge Desk' at various places in the chapter.
- ❖ Teacher should help students to find the answers of questions given in 'Think Zone' and encourage to do activities or projects given in 'Beyond the Text'.
- ❖ Teacher should ask students to explore the names of the states where these disasters have occurred.
- ❖ Teacher should discuss some other natural disasters that occur in the world.
- ❖ Teacher should prepare lists of some major disasters such as major earthquakes, droughts, floods, etc. and the damage caused by them.
- ❖ Teacher should discuss about the rescue and help that should be given to the victims of disasters.

### EXPECTED LEARNING OUTCOMES

The students know about

- ❖ some natural disasters, their occurrence and effects.
- ❖ earthquakes, their causes, measurement and damages caused by them.
- ❖ volcanoes and their types.
- ❖ causes of tsunami, floods and droughts, and damage caused by them.
- ❖ prevention of floods and droughts.

### EVALUATIVE QUESTIONS

The teacher may ask the following questions for evaluating the understanding of students.

1. What is a natural disaster?
2. What are the causes of droughts?
3. On which scale is an earthquake measured?

4. What are seismic waves?
5. Which instrument is used for measuring an earthquake?
6. What is seismology?
7. What is the vent of a volcano?
8. What are lava and magma?
9. What are active and dormant volcanoes?
10. What are extinct volcanoes?
11. What do you mean by waterlogging?
12. What are the causes of flood?