

Chapter 1

Natural Resources and Their Use

Section A: Fill in the Blanks

- Materials and substances that occur in nature and are valuable to humans are called _____.
- Renewable resources can be replenished through _____ and _____ cycles.
- _____ and _____ are two common examples of non-renewable energy resources.
- Overuse of chemical fertilisers leads to _____ degradation.
- The International Solar Alliance was launched by _____ and _____ in 2015.

Section B: Multiple Choice Questions (MCQs)

- Which of the following is a renewable resource?

a) Coal	<input type="checkbox"/>	b) Petroleum	<input type="checkbox"/>
c) Timber	<input type="checkbox"/>	d) Iron Ore	<input type="checkbox"/>
- What makes a natural resource usable?

a) Cultural acceptance	<input type="checkbox"/>
b) Economic feasibility	<input type="checkbox"/>
c) Technological accessibility	<input type="checkbox"/>
d) All of the above	<input type="checkbox"/>
- Which state became fully organic in farming in 2016?

a) Rajasthan	<input type="checkbox"/>	b) Tamil Nadu	<input type="checkbox"/>
c) Sikkim	<input type="checkbox"/>	d) Punjab	<input type="checkbox"/>
- The "natural resource curse" refers to:

a) Pollution due to resources	<input type="checkbox"/>
b) Resource-rich areas being poor in development	<input type="checkbox"/>
c) Unequal resource sharing	<input type="checkbox"/>
d) None of the above	<input type="checkbox"/>
- Which traditional Indian science deals with the health of trees and plants?

a) Vrikṣhāyurveda	<input type="checkbox"/>	b) Krishishastra	<input type="checkbox"/>
c) Ayurveda	<input type="checkbox"/>	d) Bhoomividya	<input type="checkbox"/>

Section C: Match the Following

Column A	Column B	Ans.
1. Bhadla Solar Park	a) Overexploited groundwater	_____
2. Punjab	b) Responsible use of resources	_____
3. Forest ecosystem	c) Produces oxygen, filters water	_____
4. Stewardship	d) Located in Rajasthan	_____
5. Non-renewable resource	e) Petroleum	_____

Section D: Write T for True and F for False in the boxes provided.

1. Trees become a resource only when they are used by humans.
2. Non-renewable resources can be replenished quickly by natural processes.
3. Water, air, and sunlight are examples of renewable resources.
4. Overuse of chemical fertilizers can lead to soil degradation.
5. The 'Natural Resource Curse' suggests that more natural resources always make a country richer.
6. A forest provides ecosystem services such as oxygen and water purification.
7. Solar energy is a non-renewable resource.
8. Cement production is one of the most eco-friendly industrial processes.
9. India is part of the International Solar Alliance.
10. Uneven distribution of resources can lead to trade and conflicts between regions or countries.

Section E: Short Answer Questions

1. What are renewable and non-renewable resources? Give one example each.

Ans. _____

2. Why is overuse of groundwater a major concern in India?

Ans. _____

3. What is meant by ecosystem services? Give two examples.

Ans. _____

4. How does traditional knowledge like Vriksayurveda help in sustainability?

Ans. _____

Section F: Long Answer Questions

1. Explain three ways in which natural resources can be categorised.

Ans. _____

2. Discuss the causes and consequences of the groundwater crisis in Punjab.

Ans. _____

3. What is the role of India in promoting solar energy? Explain with examples.

Ans. _____

SECTION G: Case Study Reflection

Based on the Punjab groundwater case (from your book):

1. What caused the groundwater crisis?

Ans. _____

2. What could be done to prevent this in future?

Ans. _____

3. Write in 3-5 sentences.

Ans. _____

SECTION H: Map Activity – Distribution of Resources in India:

1. Coal reserves - _____

2. Oil fields - _____

3. Solar energy rich regions - _____

4. Write one sentence about how each resource helps the economy.



Answer

Section A: Fill in the Blanks

1. natural resources
2. natural processes, recycling
3. Coal, petroleum
4. soil
5. India, France

Section B: Multiple Choice Questions (MCQs)

1. c) Timber
2. d) All of the above
3. c) Sikkim
4. b) Resource-rich areas being poor in development
5. a) Vrikṣhāyurveda

C: Match the Following

- | | |
|---------------------------|-------------------------------------|
| 1. Bhadla Solar Park | - d) Located in Rajasthan |
| 2. Punjab | - a) Overexploited groundwater |
| 3. Forest ecosystem | - c) Produces oxygen, filters water |
| 4. Stewardship | - b) Responsible use of resources |
| 5. Non-renewable resource | - e) Petroleum |

Section D: True / False

- | | | | | | | |
|----------|----------|----------|---------|----------|---------|----------|
| 1. True | 2. False | 3. True | 4. True | 5. False | 6. True | 7. False |
| 8. False | 9. True | 10. True | | | | |

Section E: Short Answer Questions

1. Renewable resources are those that can be replenished naturally over time, e.g., sunlight.
2. Non-renewable resources cannot be replenished quickly and are finite, e.g., coal. The extraction of groundwater exceeds the natural recharge rate in many areas.
3. This leads to depletion of water tables, increased costs, and potential water scarcity. Ecosystem services are benefits provided by nature that support human life.
4. Examples: Trees producing oxygen, forests filtering water. It promotes natural ways of growing plants, managing soil, and conserving water.
5. This reduces chemical use, maintains biodiversity, and supports long-term fertility.

Section F: Long Answer Questions

1. Three ways to categorise natural resources:
 - Renewable and Non-renewable (based on regeneration)
 - Biotic and Abiotic (living vs non-living origin)
 - Ubiquitous and Localised (available everywhere vs specific locations)
2. Groundwater crisis in Punjab – causes and consequences:
 - Caused by overuse of groundwater for water-intensive crops like paddy.
 - Use of free electricity encouraged over-pumping.
 - Chemical use led to soil and water pollution.
 - Consequences: Depleted water tables, health issues, unsustainable agriculture.
3. India's role in promoting solar energy:
 - India co-founded the International Solar Alliance in 2015.
 - Set up large solar parks like Bhadla Solar Park.
 - Invested in solar technology and shared resources with developing countries.

SECTION G: Case Study Reflection

1. Punjab's crisis was caused by overuse of groundwater due to water-intensive crops and free electricity.
2. Promote crop diversification, recharge groundwater, reduce free electricity misuse, and spread awareness.
3. Over-irrigation during the Green Revolution caused severe depletion of groundwater in Punjab. Use of chemical fertilisers made things worse. Long-term sustainable farming and efficient water use are needed.

SECTION H: Map

1. Coal reserves – Jharkhand, Chhattisgarh, Odisha, West Bengal
2. Oil fields – Mumbai High (Maharashtra), Digboi (Assam)
3. Solar energy rich regions – Rajasthan, Gujarat, Karnataka
4. One sentence each:
 - Coal powers thermal plants and supports heavy industries.
 - Oil is essential for transport, industry, and domestic use.
 - Solar energy reduces dependence on fossil fuels and supports green development.