

ENVIRONMENT

UNIT-3

(SUMMARY)

SECTION	In this UNIT, you will develop your				VOCABULARY
	LISTENING SKILLS	SPEAKING SKILLS	READING SKILLS	WRITING SKILLS	
Introduction		<ul style="list-style-type: none"> Reading clues to solve cross-word puzzles 	<ul style="list-style-type: none"> Solving a crossword 		<ul style="list-style-type: none"> Using words related to environment
(A) The Indian Rhinos	<ul style="list-style-type: none"> Expressing and arguing a point of view Taking active part in group discussions Expressing personal feelings 	<ul style="list-style-type: none"> Deducing the meaning of unfamiliar words 	<ul style="list-style-type: none"> Planning, organising and presenting ideas Comparing and contrasting ideas and reaching conclusions Writing a report 		<ul style="list-style-type: none"> Using words related to conservation Learning expressions to recommend and suggest
(B) Save Mother Earth	<ul style="list-style-type: none"> Listening for specific information from a recorded interview 	<ul style="list-style-type: none"> Role play Presenting a consensus Conveying ideas effectively Presenting oral reports Expressing and arguing a point of view Taking part in group discussions 	<ul style="list-style-type: none"> Deducing the meaning of unfamiliar words Selecting and extracting information 	<ul style="list-style-type: none"> Flow chart Formal letter to the Editor of a newspaper Writing short responses Completing a table Power point presentation 	<ul style="list-style-type: none"> Using words / phrases related to sustainability
(C) Save the Tiger	<ul style="list-style-type: none"> Listening for specific information 	<ul style="list-style-type: none"> Enacting a dialogue Group discussion followed by class presentation 		<ul style="list-style-type: none"> Analysing and inferring information 	<ul style="list-style-type: none"> Learning words related to the qualities / characteristics of a tiger Web chart Gap filling Paragraph writing Dialogue writing Note making Answering MCQs

ENVIRONMENT

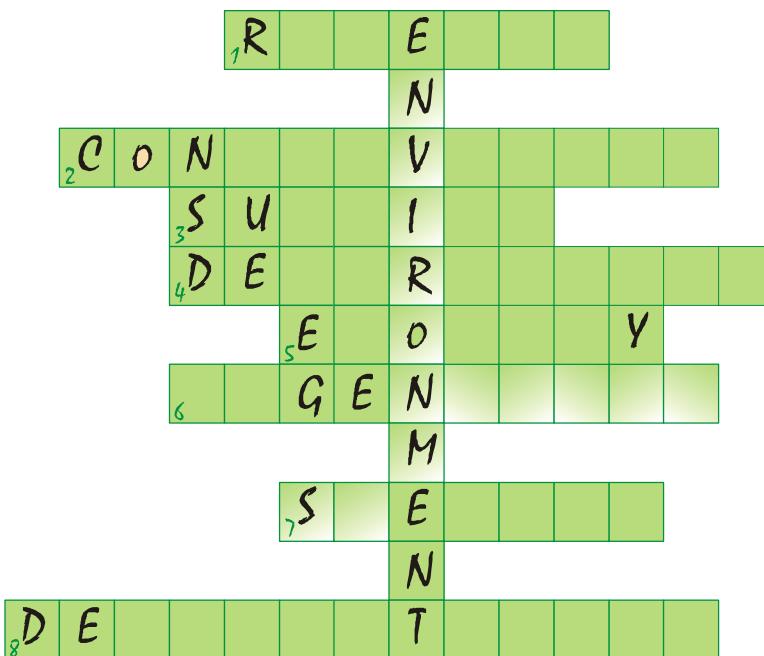
In this Unit...

A crossword puzzle, to remind us how important the Environment is.

- (A) "Rhinoceros : Do they have a future?" Find out by reading, using your vocabulary skills, group discussion, and writing a report with recommendations to the World Wildlife Federation.
- (B) Teacher/ Student to read out the interview with Smitha Sahai and Manu Srivastava about pollution given at page no 167. Perform a Role-play based on the meeting, join a 'Save Mother Earth Campaign', write a formal letter to the Editor sharing your concerns about the environmental concerns of the area you live in and prepare a powerpoint presentation on an environmental issue.
- (C) Do you know about Project Tiger? Research on the same and write a paragraph on the need to protect them. Also, read a poem. Write and enact a skit on the freedom of animals.

INTRODUCTION

Complete this puzzle.



ENVIRONMENT

UNIT-3

Clues

1. an area of land where wild animals can live safely.
2. protecting animals and plants, making sure they do not become extinct.
3. trying to stay alive in a difficult situation. In the 1990s, we were worried about the... of many animal species, such as the tiger.
4. ruining or destroying something deliberately.
5. the study of living things in relation to each other, and in relation to their environment.
6. to bring back to life (e.g. forests)
7. a class of animals or plants that have the same characteristics and are able to breed together.
8. cutting down all the trees in a forest.

A. THE INDIAN RHINOS

A.1. The Indian Rhinoceros: Where are they? Do they have a future?

We are very materialistic and are often lured into buying and using clothes and articles made from animal skin and other body parts.

Here's a shopping list...

- wall hangings
- bags
- purses
- wallets
- ornamental buttons and clips
- shoes
- hunters' trophies (legs, heads)
- medicines



ENVIRONMENT

UNIT-3

The list seems endless, doesn't it? Are these things not shameful enough to set us pondering deeply over the harm that we are inflicting on nature's creations?

1. Why is the list 'most shameful'?
2. What is the name of the organisation that has been formed to protect and conserve wild life?
3. Name at least ten other animals that are being exploited by man for commercial purposes. Surf the net to get information and complete the following table.

Animal	Part of the body used	Product
1.		
2.		
3.		
4.		
5.		
6.		
7.		
8.		
9.		
10.		

- A.2. Read this article about the great Indian Rhinoceros. [You will find the information useful for your group discussion in A.5.]

The Indian Rhinoceros or the Great One-Horned Rhinoceros or the Asian One-horned Rhinoceros (*Rhinoceros unicornis*) is a large mammal primarily found in north-eastern India, Nepal and parts of Bhutan. It is confined to the tall grasslands and forests in the foothills of the Himalayas.

The Indian Rhinoceros once ranged throughout the entire stretch of the IndoGangetic Plain but excessive hunting reduced their natural habitat drastically.

ENVIRONMENT

UNIT-3

Today, about 3,000 Indian Rhinos live in the wild, 1,800 of which are found in Assam alone. In 2008, more than 400 Indian Rhinos were sighted in Nepal's Chitwan National Park.

In size, it is equal to that of the White Rhino in Africa; together they are the largest of all rhino species. The Great One-Horned Rhinoceros has a single horn; this is present in both males and females, but not on the newborn young. In most adults, the horn reaches a length of about 25 centimetres, but has been recorded up to 57.2 centimetres in length. The nasal horn curves backwards from the nose. The horn is naturally black.

This prehistoric-looking rhinoceros has thick, silver-brown skin which becomes pinkish near the large skin folds that cover its body. The male develops thick neckfolds. It has very little body hair aside from eyelashes, ear-fringes and tail-brush.

These rhinos live in tall grasslands and riverine forests, but due to the loss of habitat, they have been forced towards cultivated land. They are mostly solitary creatures, with the exception of mothers and calves and breeding pairs, although they sometimes congregate at bathing areas.

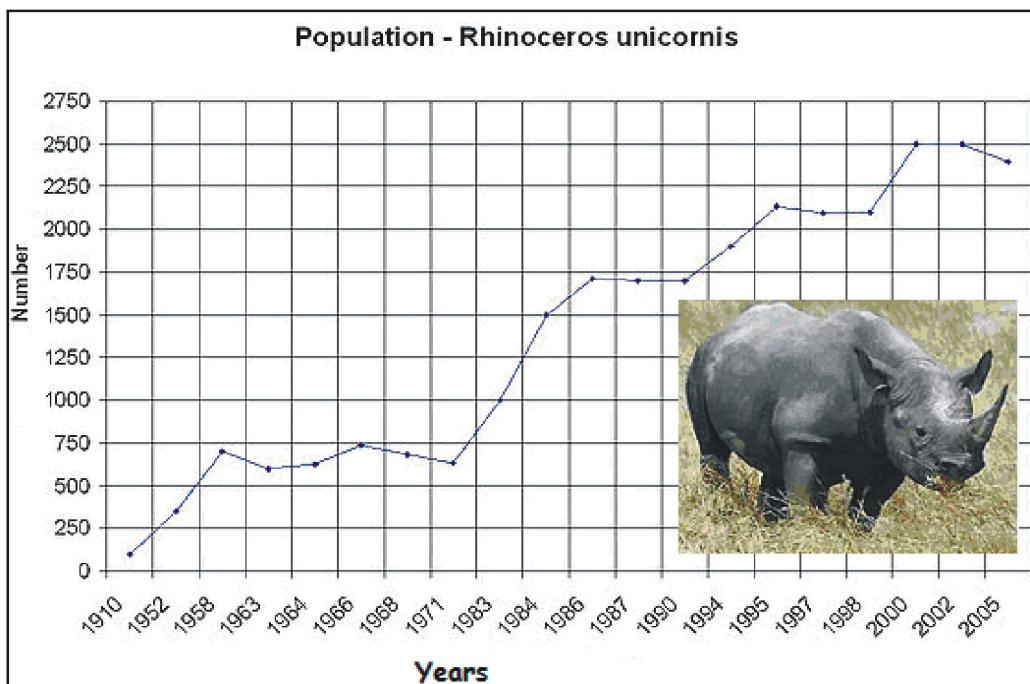
The Indian Rhinoceros makes a wide variety of vocalizations. At least ten distinct vocalizations have been identified: snorting, honking, bleating, roaring, squeak panting, moo-grunting, shrieking, groaning, rumbling and humping. In addition to noises, the rhino also uses olfactory communication.

In aggregation, Indian Rhinos are often friendly. They will often greet each other by waiving or bobbing their heads, mounting flanks, nuzzling noses, or licking. Rhinos will playfully spar, run around, and play with twigs in their mouth. Adult males are the primary instigators of fights. Fight between dominant males is the most common cause of rhino mortality. Indian rhinos have few natural enemies, except for tigers. Tigers sometimes kill unguarded calves, but adult rhinos are less vulnerable due to their size. Humans are the only other threat, hunting the rhinoceros primarily for sport or for the use of its horn. Indian Rhinos have been somewhat tamed and trained in circuses, but they remain dangerous and unpredictable animals.

ENVIRONMENT

UNIT-3

In the nineteenth and early twentieth century, the Indian Rhinoceros was hunted relentlessly. Reports from the middle of the nineteenth century claim that some military officers in Assam individually shot more than 200 rhinos. In the early 1900s, officials became concerned about the rhinos' plummeting numbers. By 1908 in Kaziranga, one of the Rhinos' main ranges, the population had fallen to around 12 individuals. In 1910, rhino hunting in India became prohibited. Some cultures in East Asia believe that the rhino hair has healing and potency powers and therefore, is used for traditional Chinese medicine and other Oriental medicines.



The Indian Rhino Vision 2020 (IRV 2020), launched in 2005 was an ambitious effort to obtain a wild population of at least 3,000 great one-horned rhinos spread over seven protected areas in Assam by the year 2020. Various organisations like the International Rhino Foundation, Assam's Forest Department, World Wild Life Fund-India, and others collaborated towards IRV 2020.

The Indian and Nepalese Governments have taken major steps towards Indian Rhinoceros conservation with the help of the World Wild Life Fund (WWF). The Kaziranga National Park and Manas National Park in Assam, Pobitora Reserve Forest in Assam (having the highest Indian rhino density in the World),

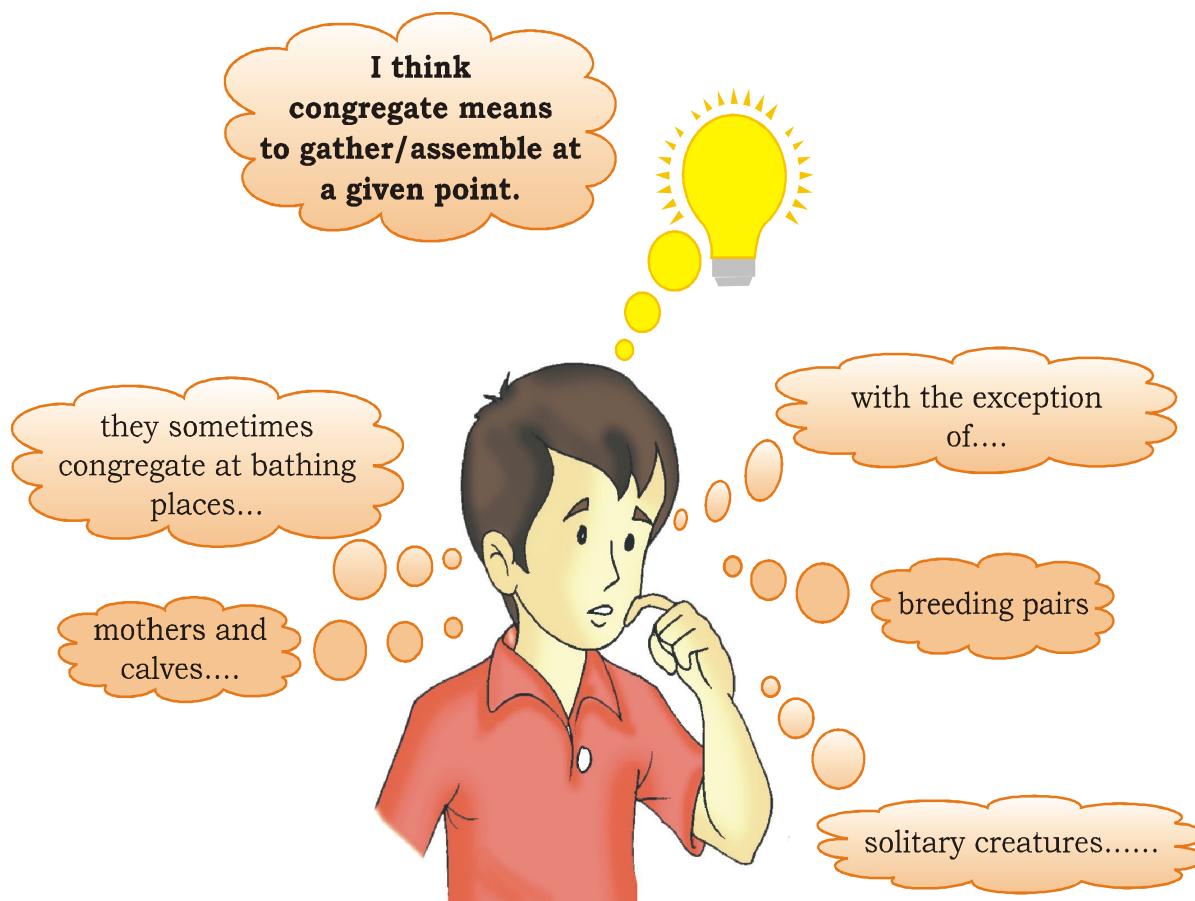
ENVIRONMENT

UNIT-3

Orang National Park of Assam, Laokhowa Reserve Forest of Assam (having a very small population) and Royal Chitwan National Park in Nepal are homes to this endangered animal. The Indian Rhino is the only large species in Asia to be down-listed from endangered to vulnerable, in the IUCN Red list in 2008.

A.3. In Units 1 and 2 you learnt and practised the skill of deducing the meanings of new words by using other words in the given context. Now use that skill to deduce the meanings of words in the article you have read. Here is an example.

- (a) They are solitary creatures with the exception of the mothers and calves and breeding pairs, although they sometimes congregate at bathing places.



ENVIRONMENT

UNIT-3

Deduce the meaning of the following words from the passage you have just read, using other words in the context to help you. Copy and complete the following:

Word	Words/ clues that helped me	What I think the word means	What the dictionary says	Were you() (tick mark) or (x)
confined				
ranged				
overlapping				
bobbing				
olfactory				
aggregation				
plummeting				
mortality				
vulnerable				
poached				

ENVIRONMENT

UNIT-3

A.4. Imagine that you are conducting a research on the conservation of a few animal species in India. You have been asked by the Wildlife Trust of India to prepare a report on the future of the YAK that lives in the Ladakh region of the Himalayan Mountains. In groups of four, discuss the issue and make notes for your report. Refer to the article in A.2 and the information in the box given here.



DOMESTIC YAK

- * herd animals 2-2.2 m tall
- * used in sports
- * kept for milk, fur, fibre, meat, drawing ploughs etc

WILD YAK

- * length:3-3.4m
- * habitat: treeless uplands
- * killed for food
- * insulated from cold by dense, close matted under hair, shaggy outer hair
- * hunted for similar reasons as the domestic ones

ENVIRONMENT

UNIT-3

Within your group, discuss :

- * What is the problem? How has it arisen?
- * What is the best way to preserve these species?
- * Why do we need to preserve these species?
- * What values need to be inculcated in the hearts of human beings? Why?
- * What actions would you recommend to the World Wildlife Federation?
- * How is global warming affecting these species?

A.5. During your discussions in groups, and in your individual written report, you will find the following language useful:

GROUP DISCUSSION

When recommending

I	propose suggest recommend	that...
---	---------------------------------	---------

What about? Why don't we	
We could think	consider..... about

WRITTEN REPORT

When recommending

I	propose suggest recommend urge	that.....
---	---	-----------

I strongly recommend that.....	
--------------------------------	--

I urge the commission to.....	
-------------------------------	--

It is proposed	recommended	that.....
-------------------	-------------	-----------

My proposal	recommendation	is that..
----------------	----------------	-----------

ENVIRONMENT

UNIT-3

When giving reasons

.....as.....

.....because.....

.....since.....

When giving reasons

.....as.....

.....because.....

.....since.....

My reason is that.....

My reason is that.....

In view of the fact that.....

- A.6. As a Conservationist, write a report to the World Wildlife Federation, based on A.5. Remember 'CODER'**

FORMAL REPORT

From: (your name), Conservationist.

To: The Chairman

WWF

(Date)

(Suitable Heading)

(Suitable introduction) e.g. You recently asked me to submit a report on my study of YAK - in particular, their future. The following are my findings and recommendations.

1. The current problem.
2. Reasons why this problem has arisen.
3. Effects of the problem
4. Recommendation
5. Conclusion (Suitable ending, including other ideas for increasing YAK population)

Your name

(Conservationist)

ENVIRONMENT

UNIT-3

B. SAVE MOTHER EARTH

- B.1. Listen carefully to 'Meet the Personality of the Month Programme' read out by the teacher/ student from page no 167 and fill in the details as you listen.

ENVIRONMENTALIST: Mr Manu Srivastava

Causes of pollution

1. Atmosphere

a. _____

2. Water

a. _____

b. _____

3. Effects of pollution

a. _____

b. _____



ENVIRONMENT

UNIT-3

Human Rights activist- Ms.Shraddha Shankar

Reasons for working in the factory

a. _____

Effects

- a. _____

- b. _____

- c. _____

Steps which can be taken

- a. _____

- b. _____

- c. _____

B.2. The residents of Kanpur decide to approach the Chairman of the Municipal Corporation with the problem of pollution in their city. In groups of six, play the role of the following: (Cue cards may be given by the teacher)



ENVIRONMENT

UNIT-3

- * A farmer
- * An environmentalist
- * Chairman of the Municipal Corporation
- * President of 'Save the Ganga Project'
- * A Human Rights activist

- B.3. After the role play, the Chairman will put forward the final decision with reasons.
- B.4. As a resident of Kanpur, write a formal letter to the Editor of a prominent newspaper highlighting the problem discussed in B2. State the consequences and also suggest ways to reduce this problem.

FORMAL LETTER

A-43 Civil lines
Kanpur

14 January 20XX

The Editor
The Times of India
New Delhi

Subject:

Sir/Madam

(Body of the letter)

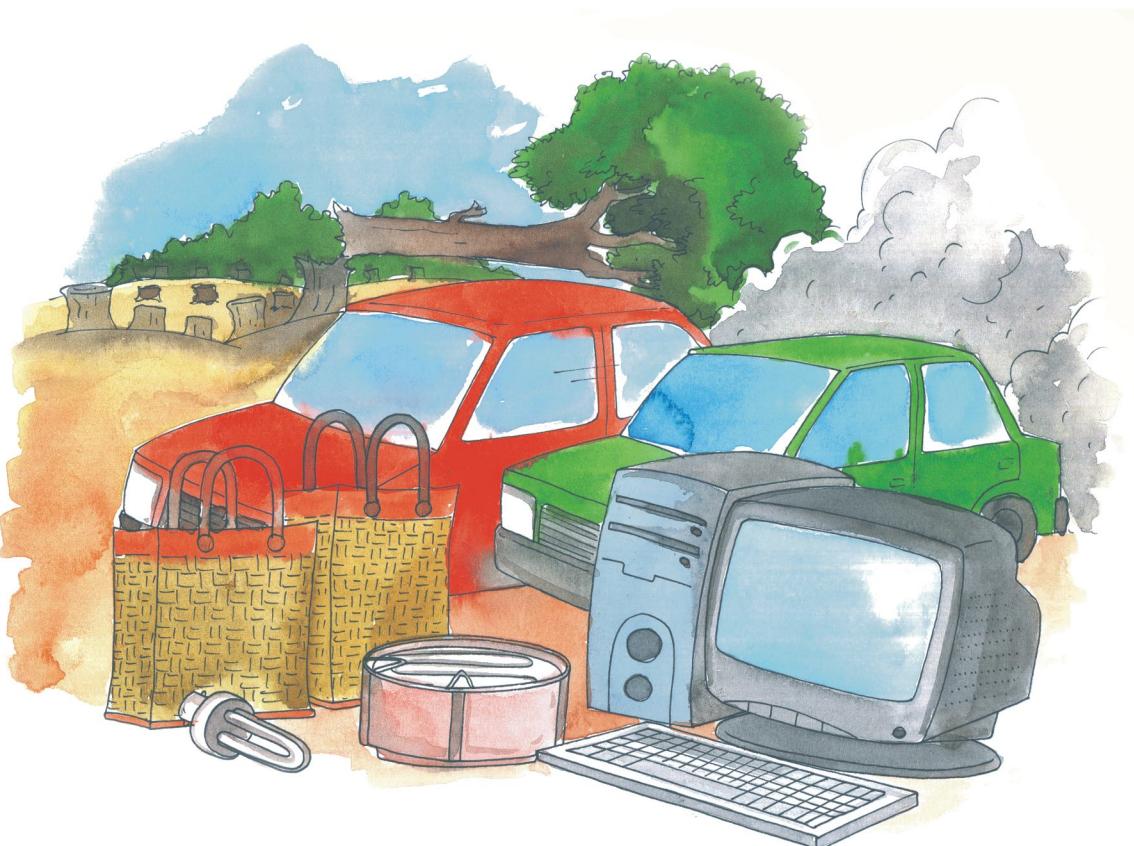
Yours truly
Signature
(Name)

ENVIRONMENT

UNIT-3

B.5. India's Major concerns

Read the following paragraph. Then work in pairs and list the different ways in which you can contribute to save Mother Earth. As an individual you can make a major contribution towards reducing India's over all emission level.



How to save the Environment at Home

There are plenty of small steps that people can take at home to help save the environment. While the eco-footprint of each step is small, thousands of people doing the same thing can make a difference. By making some small changes to the way that you do things at home, you are gradually making a difference, even as an individual. You will reduce costs and improve your health at the same time, so helping to save the environment isn't an entirely altruistic exercise after all!

SAVE MOTHER EARTH CAMPAIGN

- (a) Turn off the computer when not in use.
- (b) _____
- (c) _____
- (d) _____
- (e) _____
- (f) _____
- (g) _____
- (h) _____
- (i) _____
- (j) _____

B.6. Read the following article on Global Warming and complete the flow chart given below.

Global Warming is caused by the accumulation of greenhouse gases - CO₂, and methane in the atmosphere, resulting in the rise of Earth's over all surface temperature. India, a low latitude country, would face much of the misery due to climatic changes. Rainfall pattern is expected to undergo a major change in areas like Kerala, MP and the North-East.

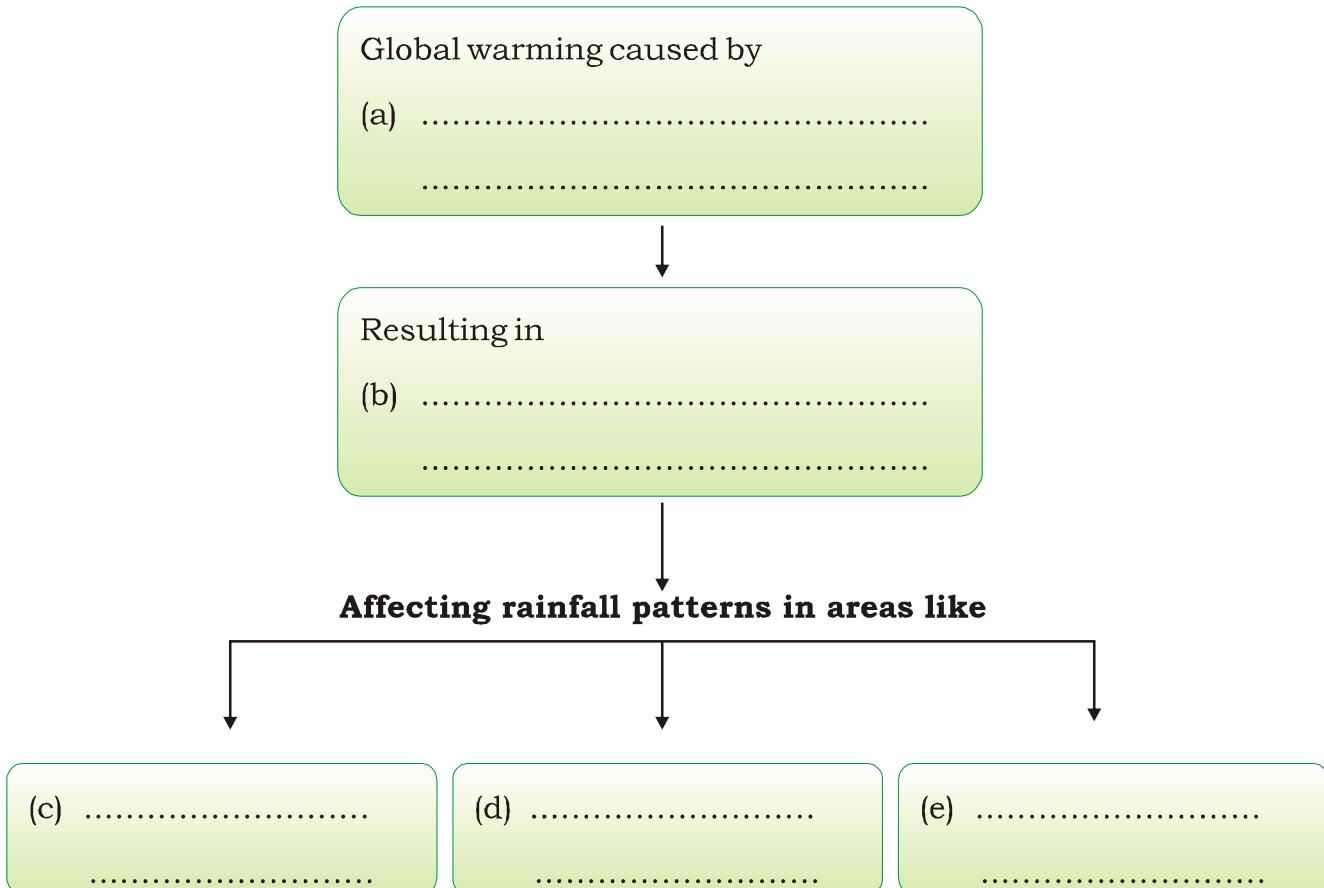
Himalayan glaciers are melting. This could prove catastrophic for those living downstream in the plains.

Due to global warming, heat is trapped in the atmosphere causing the ice to melt. Rising sea levels would inundate many of the coastal cities. Extreme weather conditions such as heavy rainfall is expected to occur soon resulting in loss of life and property.

ENVIRONMENT

UNIT-3

FLOW CHART



B.7. Carbon Footprint

Project Work

A carbon footprint is a representation of the effect human activities have on the climate in terms of the total amount of greenhouse gases produced (measured in units of carbon dioxide). So, it is a measure of the impact we make individually on the earth; by the choices we make regarding our lifestyle. Many activities generate carbon emissions, which contribute towards accelerating global warming and climate change.



Total carbon footprint/emission quantification would include energy emissions from human activities - such as, from heat, light, power and refrigeration and all transport related emissions from cars, freight and distribution.

By measuring the carbon footprint through such tools as carbon calculators, we can get a better sense of what the individual impact is and which parts of our lifestyle deserve strict regulation.

In groups, choose and research on any one aspect of our carbon footprints and how we can modify our lifestyle. Each group will then make a project on the various aspects.

Read the following excerpts from newspapers on various environmental issues.

Ban the Bag

The Indus Valley Civilisation left beautifully crafted pottery that speaks volumes of the advances its people made. After 3,000 years, if the ruins we leave behind are excavated, chances are only plastic bags would be dug up. It may sound like an exaggeration, but these bags are not biodegradable. Apart from causing emissions, when these are manufactured, noxious fumes are released while these are being burnt or disposed of. So, be kind to Mother Earth, the next time you go shopping for groceries, remember to carry a cloth bag with you.



What India Should Do

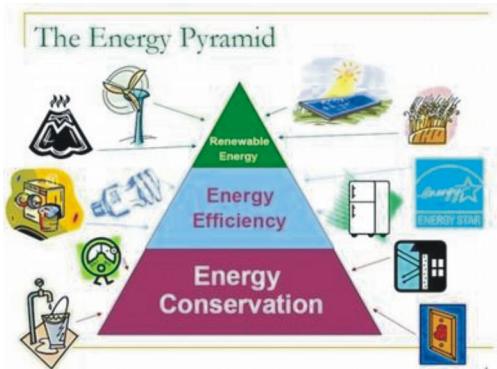
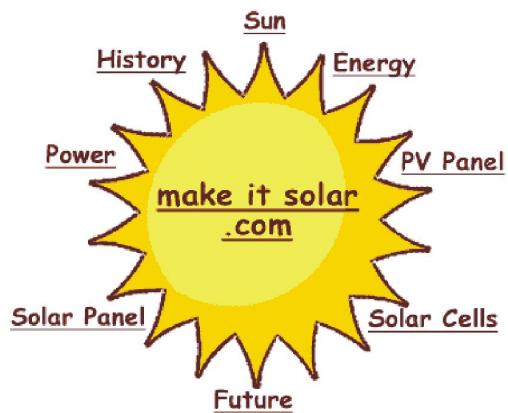
India has released the National Action Plan on Climate Change. Is it adequate? Is there more that the country can do? Here are some ways we can make a difference.

ENVIRONMENT

UNIT-3

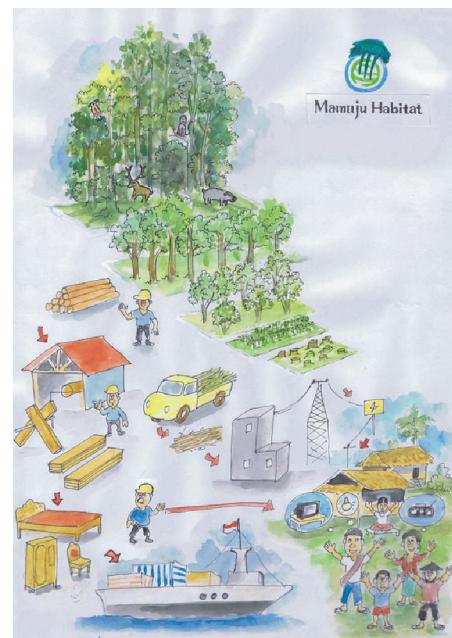
(a) SOLAR MISSION

- * To promote the use of solar energy through solar photovoltaic and thermal systems for power generation.
- * To integrate other renewable energy technologies like biomass and wind.



(b) ENERGY EFFICIENCY

- * To mitigate GHG through sector-specific and cross-cutting technology and fuel switch options.
- * To use more LNG and biomass fuels besides seeking tech transfer.



(c) SUSTAINABLE HABITAT

- * To promote energy efficiency in the residential and commercial sectors through LPG use.
- * To manage municipal solid waste and urban public transport in a better way.

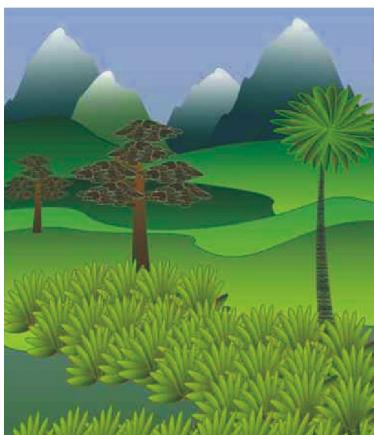
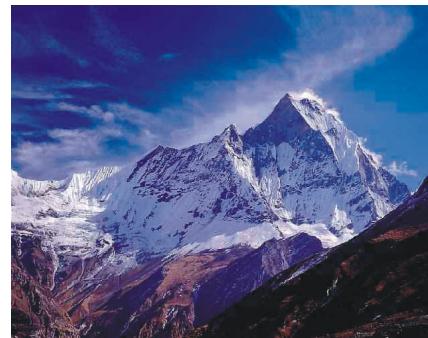


(d) WATER MISSION

- * To promote efficient water use, augment the supply in critical areas and ensure effective management of water resources.
- * To have better management of surface and groundwater, and conserve wetlands.

(e) SUSTAINING HIMALAYAS

- * To enhance monitoring and conservation of the Himalayan ecosystems, empower local communities for management of ecological resources and promote sustainable tourism



(f) GREEN INDIA

- * To reduce fragmentation of forests, enhance public and private investments for plantation, upscale joint forestry management and promote conservation of biodiversity. Need to afforest degraded lands.

(g) SUSTAINABLE AGRICULTURE:

To focus on four crucial areas - dry land agriculture, risk management, access to information and promoting the use of biotechnology.

To develop drought-and-pest resistant varieties.



ENVIRONMENT

UNIT-3

B.8. In groups, work on one of the topics mentioned in B.7.(a)-(g). Research your topic by collecting relevant articles from print and electronic media (like the National Geographic). Make a power point presentation of 10-12 minutes. You can also use film clippings to enrich your presentation.

C. SAVE THE TIGER

C.1. What is your opinion about 'Animals behind bars'? Share your views with the class.

C.2. Read through the poem and quickly make a note of any thoughts that come to you while you are reading it.

Dispute

A man and a tiger once had a dispute,

Which was reckoned greater, the man or the brute.

The tiger discoursed on his side at some length,

And greatly enlarged on his courage and strength,

Said the man, 'Don't be prating; look yonder, I pray,

At that sculpture of marble: now what will you say?

The tiger is vanquished; but as for the man,

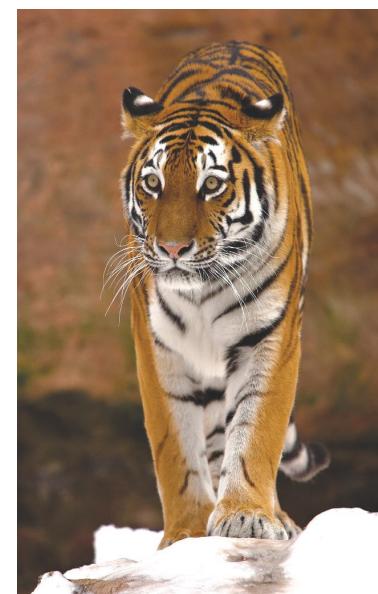
He is striding upon him: deny if you can.'

'But pray,' said the tiger, 'Who sculptured that stone?'

'One of us,' said the man. 'I must candidly own.'

'But when we are sculptors,' the other replied,

'You will then on the man see the tiger astride.'



Anonymous

ENVIRONMENT

UNIT-3

C.3. Answer the following questions by ticking the correct options:

1. What was the cause of dispute between the tiger and the man?
 - a. to establish who was superior.
 - b. to prove beasts were inferior.
 - c. to justify that beasts should be caged.
 - d. to prove that man was more intelligent.
2. What did the man do to prove his point?
 - a. he caged the tiger.
 - b. he carved a statue of a man riding a tiger.
 - c. he put the tiger in a cage.
 - d. he enslaved the tiger.
3. What was the tiger's counter-argument?
 - a. he said that he was the king of the jungle.
 - b. he claimed he ruled the world.
 - c. he said the situation would be reversed if he was the sculptor.
 - d. he threatened to devour the man in a moment
4. Select the option that conveys the central idea of the poem.
 - (i) The planet is dominated by humans.
 - (ii) The planet is commanded by wild animals.
 - (iii) The planet belongs to all its inhabitants.
 - (iv) The planet can be saved with peace & coexistence
 - (v) The planet needs humans as caretakers.
 - A. (i), (ii), (iii)
 - B. (ii), (iii), (iv)
 - C. (iii), (iv), (v)
 - D. (i), (iv), (v)

ENVIRONMENT

UNIT-3

- C.4. Read the given extract and answer the questions that follow by selecting the right option.

Said the man, 'Don't be prating; look yonder, I pray,

At the sculpture of marble: now what will you say?

The tiger is vanquished; but as for the man,

He is striding upon him: deny if you can.'

'But pray,' said the tiger, 'Who sculptured that stone?

'One of us,' said the man, 'I must candidly own.'

'But when we are sculptors,; the other replied,

'You will then on the man see the tiger astride.'

1. Choose the option that displays emotion that the poet is expressing with regards to the tiger.
 - A. agony, anger, excitement.
 - B. agony, frustration, hurt.
 - C. anger, hurt, frustration.
 - D. anger, hurt, anxiety.
2. Choose the correct option with reference to the two statements given below:
Statement 1: It is the man who brags about his false strength.
Statement 2: The tiger is dignified and modest in his reply.
 - A. Statement 1 is true but Statement 2 is false.
 - B. Statement 1 is false but Statement 2 is true.
 - C. Statement 1 & 2 are true but Statement 2 cannot be inferred from the extract.
 - D. Statement 1 & 2 are true and statement 2 can be inferred from the extract.
3. Pick the option that best describes the mood of the poem.

A. Gloomy	B. Reflective
C. Ominous	D. Hopeful

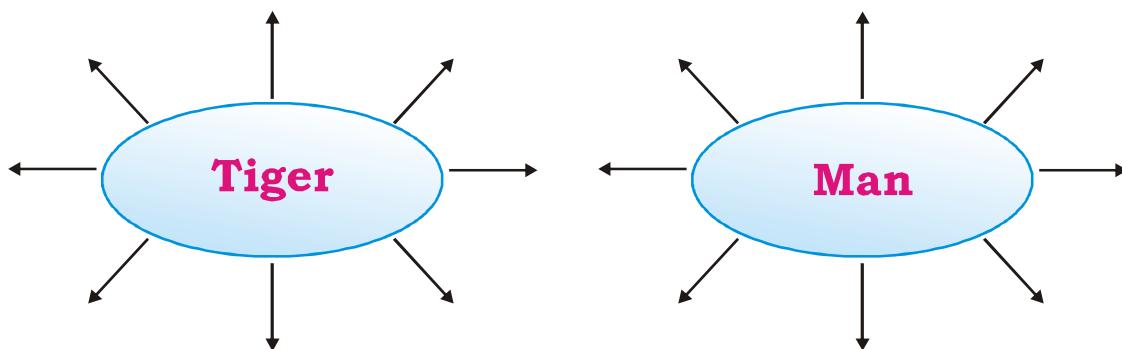
ENVIRONMENT

UNIT-3

C.5. Answer briefly.

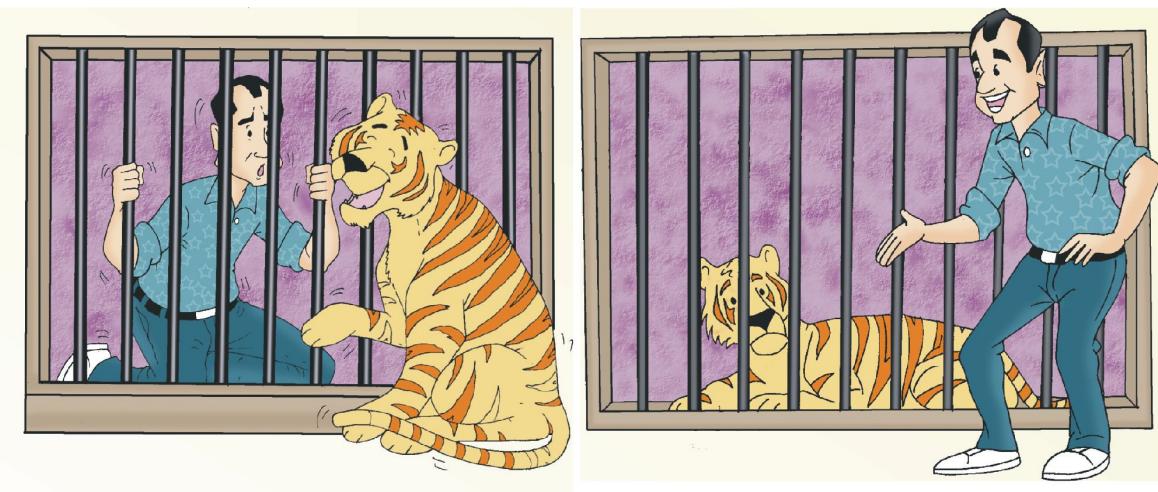
1. Why do you think Man wants to assert his superiority?
2. How would you resolve the dispute between Man and the Brute?

C.6. In pairs discuss the qualities and characteristics of tiger and man.
Complete the web charts.



C.7. Working in groups of four, write a dialogue between

- * A tiger behind bars and a man
- * A man in a cage and a tiger.



ENVIRONMENT

UNIT-3

C.8. Listen to the extract on Tigers read by the teacher/ student from page no 169, and as you listen, complete the summary given below by filling the blanks.

1. The next generation is not likely to see the tiger because of
.....
2. laws against poachers must be enforced.
3. The responsibility of protection of the tiger lies with the
4. One of the reasons for Tigers becoming extinct is
5. Destroying nature means
6., and are different types of tigers.
7. is a wild life conservation project.
8. Tigers are found in the evergreen and monsoon forests of the
9. Though tigers are mostly nocturnal, species may also be active during the day.
10. The body length of the tiger is cm.



Tiger on the edge, nature on the brink

ENVIRONMENT

UNIT-3

Interesting facts

- A tiger has been reported to cover upto 10 meters in a horizontal leap.
- Most tigers have more than 100 stripes, and no two tigers have identical stripes.
- The roar of a tiger can be heard from more than a mile away.
- Tigers are largely muscular and rely on stealth and power rather than on speed to bring down a prey.

C.9. Tiger in Trouble

Since some tiger parts are used in traditional medicine, the tiger is in danger. Apart from its head being used as a trophy to decorate walls, tigers are also hunted for the following.

Head: As a trophy on the wall.

Brain: To cure laziness and pimples.

Teeth: For rabies, asthma and sores.

Blood: For strengthening the constitution and will power.

Fat: For vomiting, dog bites, bleeding haemorrhoids and scalp ailments in children.

Skin: To treat mental illness and to make fur coats.

Whiskers: For toothache.

C.10. Read the two headlines and research the story behind the change. Share your findings with others in class.

MASSIVE POACHING NEARLY WIPES OUT THE ENTIRE TIGER POPULATION AT ONE OF THE TIGER RESERVES IN INDIA



TIGER POPULATION HAS A HIGH CHANCE OF DOUBLING BY THE END OF 2022