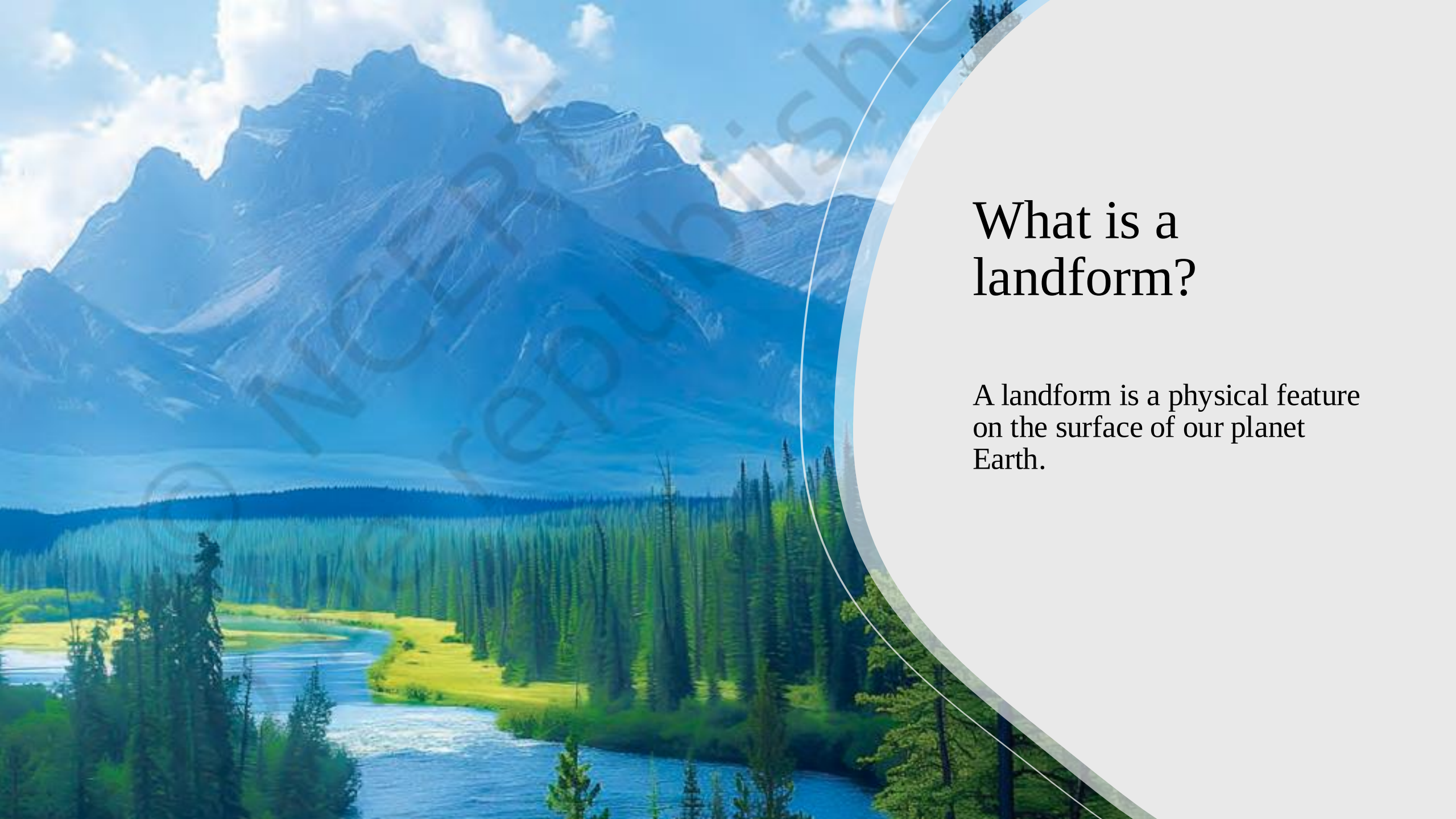


CLASS VI
SUBJECT: GEOGRAPHY
CHAPTER: 3
LANDFORMS AND LIFE

SUBTOPICS

- Landforms
- Mountains
- Plateaus and
- Plains
- Deserts





What is a landform?

A landform is a physical feature on the surface of our planet Earth.

What are the major types of landforms and their significance to life and culture?



Landforms are typically classified into three main types: mountains, plateaus, and plains. Each type has distinct physical characteristics and environmental conditions.



Throughout history, the type of landform where people have lived has significantly influenced their way of life and activities.



Whether in the rugged mountains or vast plains, rivers have played an essential role in shaping cultural practices.



Many communities have attached deep cultural and spiritual significance to rivers, especially their sources and confluences with other rivers.



In India, such locations are often considered sacred, and numerous festivals, ceremonies, and rituals are held at these sites.

Important terms and their definitions

Altitude: The height of an object above sea level. Examples: the altitude of a mountain, the altitude of a bird or plane in flight, the altitude of a satellite.

Precipitation: Water from the atmosphere reaching the ground in any form — rain, snow and hail are the most common forms of precipitation.

Montane forest: A type of forests that grows in mountainous regions.

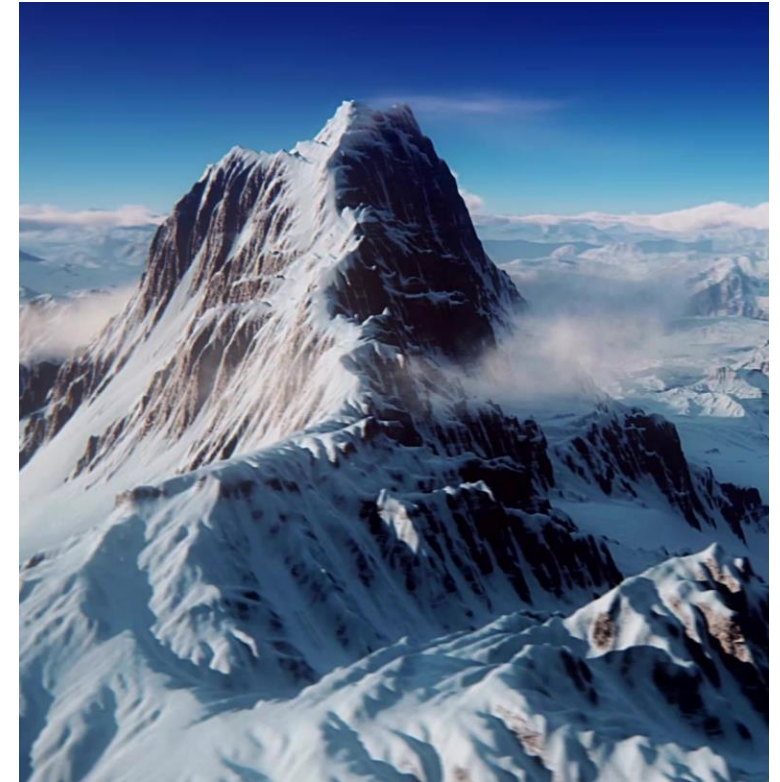
Moss: A small green plant without flowers or true roots, often spreading in a cushion-like cover.

Lichen: A plant-like organism that generally clings to rocks, walls or tree.

Hills: Other highlands with a lower height, less steep slopes and rounded tops are called hills. Shorter and more rounded mountains and hills, like the Aravalli Range, are much older and have been rounded by erosion.

Ranges: Most of the world's mountains are grouped in mountain ranges, such as the Himalayas in Asia, the Alps in Europe and the Andes in South America.

Valley: A lower area between hills or mountains, often with a river or stream flowing through it.



Features of Mountains

- Mountains are landforms that are much higher than the surrounding landscape.
- They can be recognised by a broad base, steep slopes and a narrow summit.
- Depending on their height, some mountains are covered with snow. At high altitudes, the snow may never melt, leaving the mountain permanently snow-capped.



What types of vegetation and wildlife are found in mountain slopes, and how do they change with altitude?



- Mountain slopes are often covered with a type of forest called montane forest, where conifer trees such as pines, firs, spruce and deodar are common.
- These conifer trees grow tall and cone-shaped, with thin, pointed leaves.
- At higher altitudes, the trees give way to grasses, mosses and lichen.
- Deep forests, flowing rivers, lakes, grasslands and caves in the mountains are home to diverse fauna, for instance, the golden eagle, the peregrine falcon, the Canadian lynx, the snow leopard, the ibex, the Himalayan tahr, the mountain hare, the yak, the grey fox and the black bear.

How do people live in mountainous regions, and what are the main occupations and challenges they face due to the rugged terrain?

- The mountain terrain is usually rugged or rough, and has steep slopes.
- This means that regular farming can only be practised in some valleys.
- Cultivation is practised on the slopes by cutting steps into the slope. This is called terrace farming.
- In many mountainous regions of the world, herding is the preferred occupation over agriculture.



How does tourism affect mountain regions, and what challenges arise from an excessive influx of visitors?

Tourism is often an important source of income for the people living in the mountains.

The crisp mountain air and scenic beauty attract many tourists.

Some tourists also go to the mountains for sports such as skiing, hiking, mountaineering and paragliding.

For many centuries, people have also travelled to these uplands for pilgrimages to holy sites.

But an excessive inflow of visitors can also put the fragile mountain environment under pressure; it is often difficult to find the right balance.

Important Terms



Flash flood: A sudden local flood, often caused by a cloudburst.



Landslide: The sudden collapse of a mass of earth or rock from a mountainside.



Avalanche: The sudden fall of snow, ice or rocks from a mountainside; often occurs when the snow starts melting.



Cloudburst: A sudden violent rainstorm.

Characteristics of plateaus

- A plateau is a landform that rises up from the surrounding land and has a more or less flat surface, some of its sides are often steep slopes.
- Like mountains, plateaus can be young or old in terms of the Earth's history.
- The height of plateaus can vary from a few hundred metres to several thousand metres.
- Two examples of plateaus are the Tibetan Plateau, the largest and highest plateau in the world, and the Deccan Plateau.



Explain the significance of plateaus in terms of mineral resources, agriculture, and natural beauty, providing examples from different regions.



Plateaus are rich in mineral deposits; they have been called 'storehouses of minerals'.



As a result, mining is a major activity on plateaus, where many of the world's largest mines are found. For example, the East African Plateau is famous for gold and diamond mining.



In India, huge reserves of iron, coal and manganese are found in the Chhota Nagpur Plateau. The plateau environment is very diverse across the world.



Many plateaus have a rocky soil, which makes them less fertile than plains (see next section) and therefore less favourable to farming. An exception is that of lava plateaus (that is, formed through volcanic activity), as they often have a rich black soil.



Plateaus are also home to many spectacular waterfalls. The Victoria Falls on the Zambezi River in southern Africa, the Hundru Falls on the Subarnarekha River in the Chhota Nagpur Plateau and the Jog Falls on the Sharavati River in the Western Ghats are a few such waterfalls. The Nohkalikai Falls drop down 340 metres from the Cherrapunji Plateau (in Meghalaya).

The key characteristics of plains

Plains are landforms that have an extensive flat or gently undulating surface.

01

They do not have any large hills or deep valleys.

02

They are generally not more than 300 metres above sea level.

What are floodplains, and how are they formed? Explain why they are ideal for agriculture.



Floodplains are one type of plains formed by rivers originating in mountain ranges, where they collect particles of rock, sand and silt called 'sediments'.



These sediments are carried all the way to the plains, where the rivers deposit them, making the soil very fertile.



As a result, these plains are ideal for growing crops of all kinds, and agriculture is a major economic occupation in this landform.



Plains also support a variety of flora and fauna.

What are the major occupations of people living in the Ganga plains? Explain the benefits and challenges associated with irrigation in the Ganga plains.

- The major occupations of people living in the Ganga plains include river fishing and agriculture.
- Food crops such as rice, wheat, maize, barley and millets are grown. Fibre crops such as cotton, jute and hemp are also grown in the Gangetic plain.
- Traditional agriculture has been mostly rainfed (that is, watered through rainfall). In recent decades, however, agriculture has turned to irrigation, with water brought to the fields through networks of canals or pumped from groundwater.
- While irrigation has increased agricultural production, it has also contributed to the depletion (or decrease) of groundwater.
- This presents a challenge for the future of agriculture in the region. Some of the other problems affecting the Ganga plains include high population and pollution.



Plains

- Rivers play an important role in the economic development of plains regions.
- Because plains have a gentle slope, river navigation is easy and supports a lot of economic activities.
- In earlier days, people also used rivers extensively to travel from one place to another.



The main characteristics of deserts

Deserts are considered to be large and dry expanses with very little precipitation.

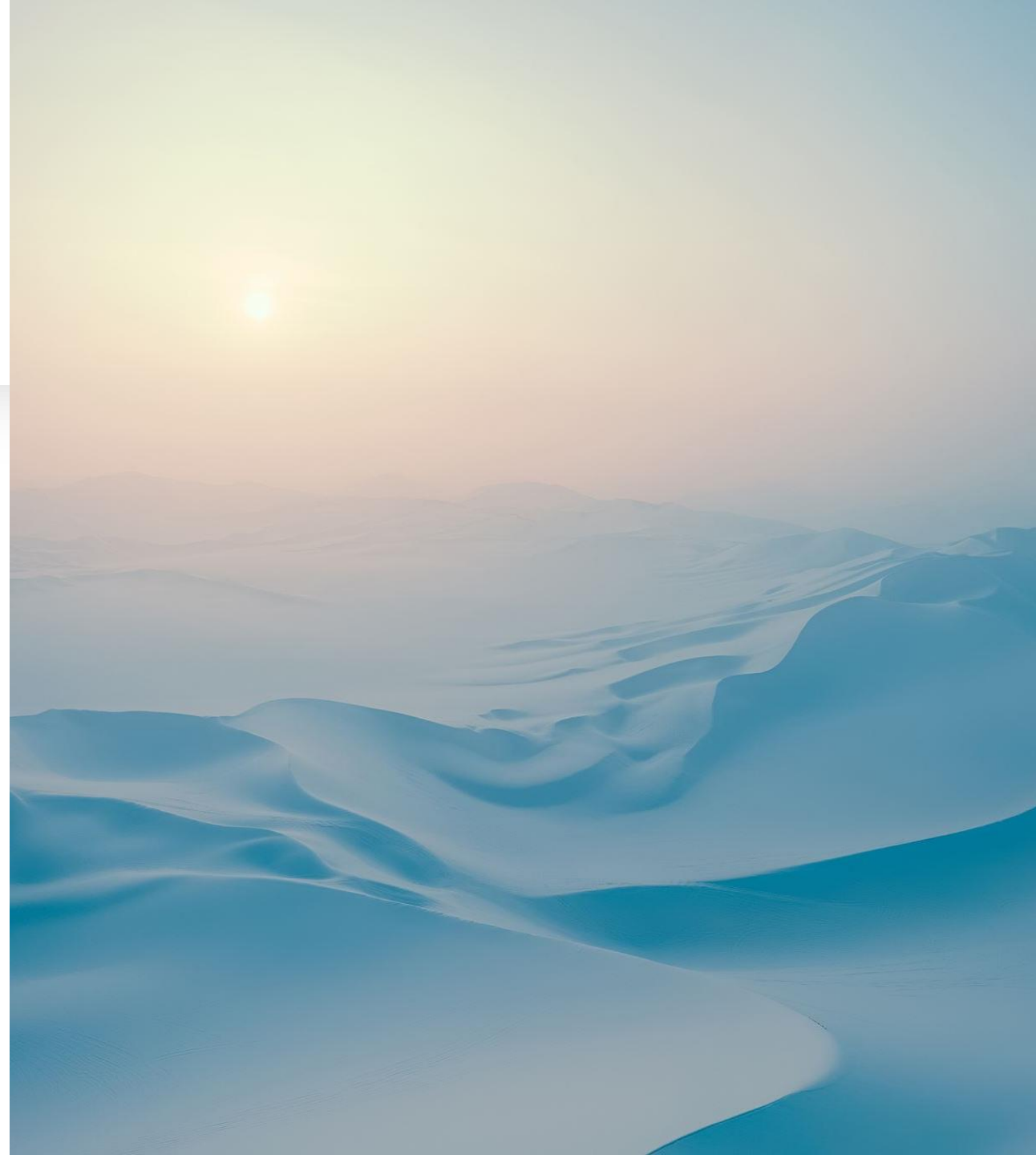
Their flora and fauna are also unique.

Despite harsh living conditions, humans have adapted to most of the deserts.

In India, communities living in the Thar Desert, or migrating through it, hold rich cultural traditions, such as folk songs and legends, related to the desert.

Types of Deserts:

- Hot Deserts: Some deserts are hot, like the Sahara Desert in Africa or the Thar Desert in the northwest of the Indian Subcontinent.
- Cold Deserts: Some deserts are cold, like the Gobi Desert in Asia. (Some experts also describe the Antarctica continent as a desert.)



THANK YOU

