

Difference Between Western Ghats and Eastern Ghats of India

The Eastern Ghats and Western Ghats form the boundary of the Deccan plateau of India. One of the most prominent differences between Eastern Ghats and Western Ghats is that Western Ghats are an elevated continuous range of mountains, whereas the Eastern Ghats are a discontinuous low-height mountain range.

Go through the geographical features and Western Ghats and Eastern Ghats Difference.

Western Ghats and Eastern Ghats	Western Ghats	Eastern Ghats
Elevation	600 – 1200m, still higher in South	150-300 m
Rocks	Rock System – Charnochite	Gneiss, Khondalite, Dharwar
Geographical Feature	Due to tilting, further upliftment	Further subdued
Watershed Feature	The most important watershed in southern India – all east-flowing rivers emerging	Poor Watershed
Mountain Type	Treppen – Like formation, look like block mountains in the west	Ancient fold mountains and presently mountains of denudation
Types of Forest Found	Densely Forested	Less Forested – Mostly dry deciduous to moist deciduous
Types of Soil	Laterite Soils found	Red Sandy soil
Rainfall	100cm isohyete is the crest of Western Ghats. It rains 150cm+ all along the west coast	Rainfall 60-100 cm

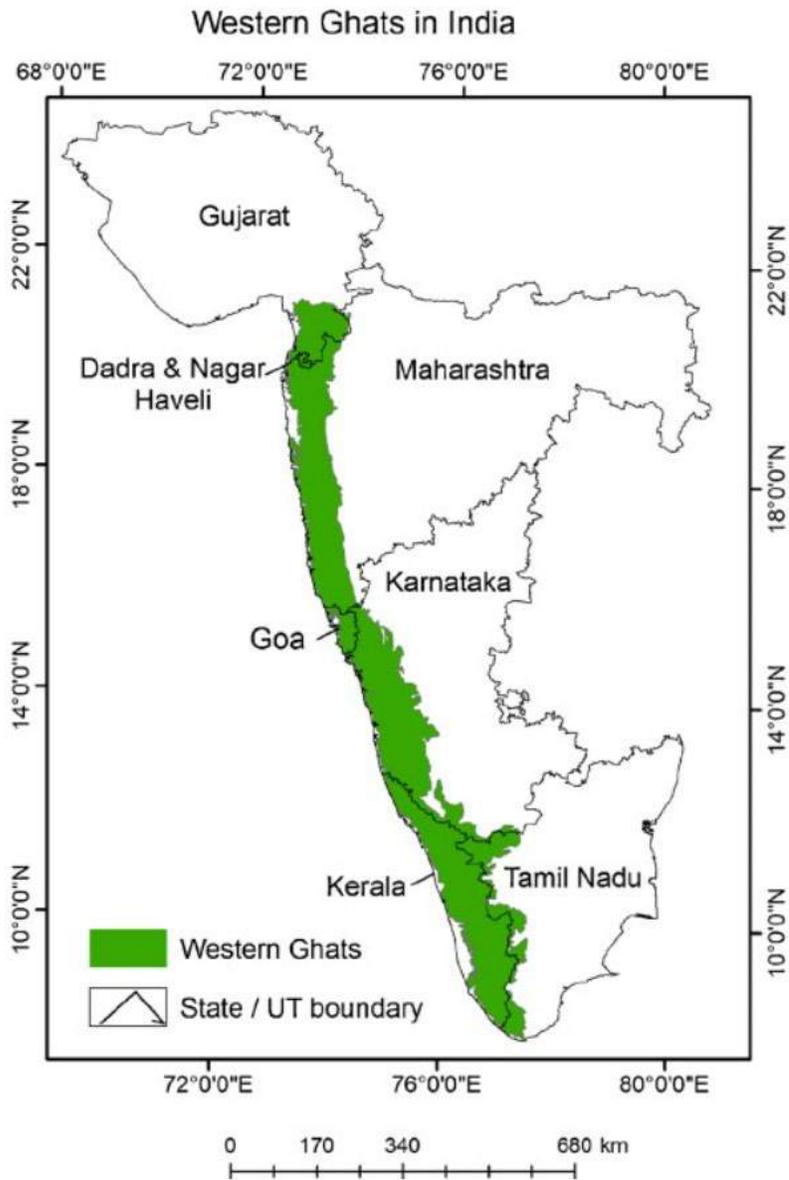
Difference Between Western Ghats and Eastern Ghats

The Western Ghats and Eastern Ghats are biodiversity regions that offer ecological richness. Though they are of the same nature, there are some differences between them. These have been concisely tabulated in the table below;

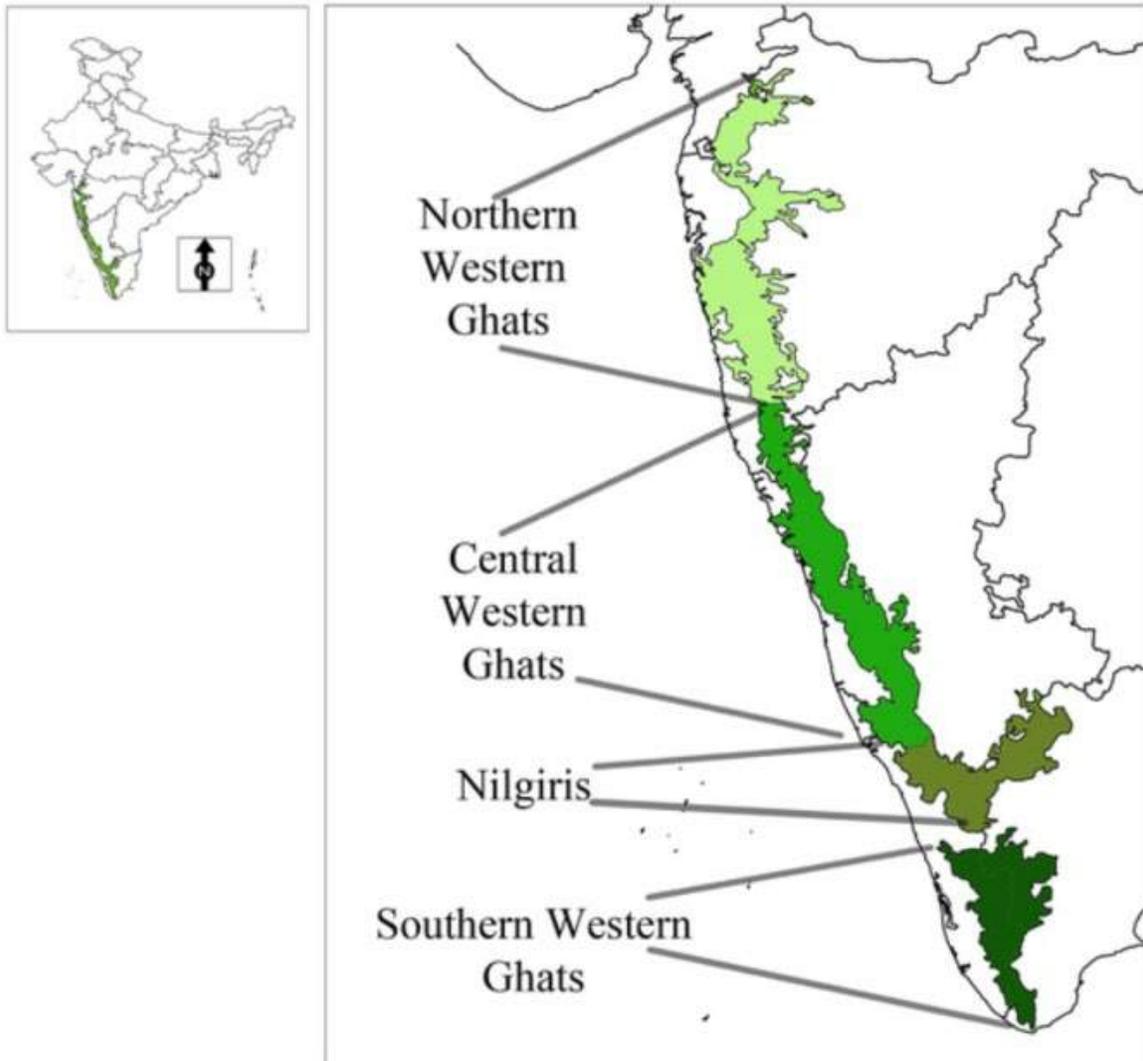
Western Ghats	Eastern Ghats
The western coast of India is parallel to them. Due to their continuous nature and lack of any discernible pauses, they are rather difficult to navigate through.	The eastern lowlands of India run parallel to the eastern ghats.
Important rivers including the Krishna, Godavari, and Tungabhadra originate in the western ghats.	Different from the western ghats, they are fragmented in nature and are traversed by rivers that empty into the Bay of Bengal. As was already mentioned, most of these rivers have their beginnings in the Western Ghats.
It should be noted that the western ghats of India have a substantial impact on how rain falls during the monsoon at the country's western border.	It is important to remember that the eastern ghats have a lower impact than the western ghats.
It causes orographic rainfall, which causes the leeward side of the mountains to stay dry while the windward side receives copious amounts of rain.	The Eastern Ghats' highest point is the Jindhagada peak (1690 meters). The name Arma Konda or Sitamma Konda has also been used for it.
Even though there are evergreen woods in the western ghats, coffee is the primary crop farmed there.	It is also possible to compare the height variations between the tallest peaks in the two ghats. The eastern ghats' Jindaghara is 1690 metres high.

Western Ghats

The Western Ghats were created by the Arabian basin being subducted and the peninsula being tilted northeast and east during the Himalayan uplift. Because of the staircase and escarpment formations on the hill, it appears as though mountains towards the west are blocked.



- The Western Ghats spans across six states: Maharashtra, Gujarat, Goa, Tamil Nadu, Karnataka, and Kerala.
 - It has been given the position of being a UNESCO World Heritage site as one of the eight "hottest hotspots" for biological diversity on the globe.
 - According to UNESCO, the Western Ghats are older than even the Himalayas. By blocking rain-filled monsoon winds that arrive from the southwest in the late summer, they have an impact on the weather patterns associated with the Indian monsoon.
 - It spans the entire distance from Kanyakumari to Tapi Valley. Up to 11° N, it is referred to as Sahyadri.
 - It is split into three sections.
 - Middle Sahyadri(Central Western Ghats)
 - Northern Western Ghats
 - Southern Western Ghats



Northern Western Ghats

In the region between the Tapi Valley and the 16° N latitude lie the Northern Western Ghats. It has basaltic lava all over it. Below are some important facts about the same;

- The highest point is Kalsubai. Mountains are cut through by rivers.
- The horizontal sheets of Deccan lavas make up the northern Ghats, which extend from Tapi Valley to a bit to the north of Goa (Deccan Traps).
- Although some peaks reach greater elevations, the average elevation of the Ghats in this section is about 1,200 m above mean sea level.
- Kalsubai (1,646 m), Salher (1,567 m), which is located around 90 km north of Nashik, Harishchandragad (1,424 m), and Mahabaleshwar (1,438 m) are significant peaks.
- The Konkan Plains in the west and the Deccan Plateau in the east are connected by road and rail through the passes known as Thal ghat and Bhor ghat.

Middle Sahyadri (Central Western Ghats)

The Nilgiri hills are located in the Middle Sahyadri range, which extends from latitude 16°N. Some key facts about them have been listed below;

- Gneisses and granites make up this part.
- There is a lot of woodland in the area.
- The western scarp has been extensively fractured by headward erosion caused by westward moving streams.
- Although many peaks top 1500 metres in height, the average elevation of the place is 1200 metres.
- The Vavul Mala (2,339 m), Pashpagiri (1,714 m), and Kudremukh (1,892 m) are significant peaks.
- Around the triangular intersection of Kerala, Karnataka, and Tamil Nadu, the Nilgiri Hills rise abruptly to heights of more than 2,000 metres and link to the Sahyadris.
- They serve as the juncture where the Western and Eastern Ghats converge.
- The two most prominent peaks in this region are Makurti (2,554 m) and Doda Betta (2,637 m).
- It is in the Central Western Ghats and has a granitic structure.
- Karnataka's tallest peak, Mullayanagiri, is located on Baba Budan Hill. Along with waterfalls like Gersoppa/jog Falls across the Sharavathi River, this area has developed nick sites.
- This area is marked by two distinct characteristics: the Malnad hills and the Maidan plateaus.
- The Talakaveri Lake is fed by the Kaveri River, which originates in the Brahmagiri Hills.

Southern Western Ghats

The main Sahyadri range and the southern portion of the Western Ghats are divided by Pal ghat Gap. Some factoids about the same have been listed below;

- A different name for it is the southern mountain complex.
- The high mountains abruptly come to a stop on each side of this gap.
- Pal Ghat Gap is a rift valley. The lowlands of Tamil Nadu and the coastal plains of Kerala are connected by a multitude of motorways and railway lines that take advantage of this gap.
- Through this opening, moist-bearing clouds from the southwest monsoon can travel some distance inland and provide rain to the Mysore region.
- There is a complicated network of steep, uneven slopes on both the western and eastern sides of the Ghats south of the Pal ghat Gap.
- Southern India's highest point is Anai Mudi (2,695 m).
- Three mountains that extend in opposing directions surround Anai Mudi: towards the north, the Palani (900-1,200 m) range, towards the northeast and south, the Cardamom Hills or Maalaimalar range.
- The Nilgiris, Annamalai, and Cardamon ranges, as well as the Palani Palghat gap, which is situated between the southern part of the Western Ghats and the main Sahyadri range, are the three parallel ranges to the coast that make up the southern Western Ghats.
- The elevation of these mountains varies from 1600 to 2500 metres. The tallest peak in Nilgiris is Doddabetta.
- The highest peak in South India and Annamalai is Anamudi. Agasti Malai is the highest point in the Cardamom Hills.

Eastern Ghats

The Eastern Ghats practically run alongside India's east coast, separating the sea from their base with vast open plains. Some important facts about them have been given below;

- From Mahanadi in Odisha to Vagai in Tamil Nadu, it is a chain of severely fragmented and disjointed hills. They almost disappear between the Krishna and the Godavari.
- Both structural cohesion and physiographic continuity are absent. These hill clusters are so frequently acknowledged as distinct entities.
- The Mahendra Giri (1,501 metres) is the tallest peak in the Maliya range, with peaks and ridges ranging in height from 900 to 1,200 metres.
- In the Madugula Konda range, higher elevations range from 1,100 to 1,400 metres, with many summits above 1,600 metres.
- Prominent peaks in the Araku Valley include Sinkram Gutta (1,643 m), Arma Konda (1,680 m), and Jindhagada Peak (1,620 m).
- Between the Krishna and Godavari rivers, the Eastern Ghats become less steep and are home to Gondwana formations.
- The Nallamala Range, also known as the Eastern Ghats, is a more or less continuous hill range found in the Andhra Pradesh districts of Kurnool and Cuddapah.
- The southernmost part of this range is known as the Palkonda range.
- Only the Shevroy-Karayan Hills and the Javadi Hills, two distinct 1,000 m height peaks, may be found among the low-lying hills and plateaus to the south.
- Karnataka's Biligiri Rangan Hills, which are close to the Tamil Nadu border, are 1,279 metres high.
- Further south, the Eastern Ghats and the Western Ghats converge.



Significance of Western and Eastern Ghats

The Western and Eastern Ghats are extremely important biodiversity hotspots as has been recognised by UNESCO as well. Below are a few points that explain the significance of these ghats;

- The Western Ghats are home to a variety of habitats, including montane grasslands and tropical wet evergreen forests. These habitats contain a variety of medicinal plants as well as essential genetic resources including wild cousins of fruit, cereals, and spices.
- They also have the peculiar shola habitat, which is made up of sections of evergreen woodland mixed in with highland meadows.

- The Western Ghats are important watersheds and for hydrology.
- Millions of people depend on the land and water in the area for their livelihoods. No other region touches the lives of as many people as the Indo-Malayan region.
- The Eastern Ghats are located in Tamil Nadu, Karnataka, Andhra Pradesh, and Odisha.
- It has a large effect on the environment, food production, biodiversity, and tree energy storage.
- Both the South-West and North-East Monsoons depend on them heavily.
- Numerous creatures, including elephants and tigers call these discontinuous woods home. There are about 400 bird species and 2600 plant species living here

