CHAPTER I

GEOGRAPHICAL SETTING

The region under consideration is what today constitutes the modern State of Himachal Pradesh. It lies in the western Himalaya, spreading between 32° 22' 40" - 33° 12' N and 75° 47' 55" - 79° 4' 20" E. To its north lies the state of Jammu and Kashmir, whereas Uttar Pradesh is in the South East with Haryana on the South and Punjab on the West. In the east it forms India's border with Tibet. Being thus demarcated it is a roughly rectangular mountain region with height differences ranging between 350 metres to 6,975 metres.

Physiographically Himachal Pradesh is a complex mosaic of hills, valleys and snow clad peaks. Among the enormous mountain formations may be counted the Dhauladhar, Pir Panjal, The Great Himalyan and Trans-Himalayan ranges which because of their height are visible from a great distance.

If we are to take the mountains as a distinguishing factor the region can be divided into a few broad zones. These are the Shiwaliks, The Mid Himalayas and The Greater Himalayas.¹

The range located closest to the plains consists of low hills or The Shiwaliks. The difference in altitude here varies from 600 metres to 1000 metres. The Shiwaliks, it is said, means "Tresses of Shiva". They are composed of highly unsolidified deposits which easily lend themselves to erosion. They maintain a rectangular course from the river Ravi to the Yamuna in the South of the region and stretch across the lower areas of Sirmour, Solan, Bilaspur, Una and Kangra. With the passage of time, however, the Shiwaliks have been highly deforested resulting in widespread erosion leading to the formation of Chos (Marsh land). The important town situated in the Shiwaliks are Paonta, Nahan, Parwanoo, Nalagarh, Arki, Kunihar, Kasauli, Bilaspur, Ghumarwin, Hamirpur, Una, Dehra and Nurpur.

II. The second range of mountains or the mid Himalaya is marked by a gradual elevation towards the Dhauladhar and the Pir-Panjal ranges. The Dhauladhar or The White range is the most majestic and striking feature of the Himachal mountain scape. It branches off from the great Himalayan range near Badrinath in the U.P. Himalaya and passes right through the middle of Himachal Pradesh. It is intercepted by the river sutlej at Rampur Bashahr, and by the Beas river in the south west of Chamba. Near Dharamsala, it is so near the

These passes were important trade routes between Himachal Pradesh and Ladakh and Tibet during British time.  

III. The great Himalayan range (5000 to 6000 metres) runs along the eastern boundary and is cut across by defiles of the Sutlej. This range separates the drainage of the river Spiti from that of the Beas. There are certain famous passes across this range, such as the Kangra, Baralacha, Kunazam, Parang and Shipki.

The Zanskar range is the eastern range which separates Spiti and Kashmir from Tibet. Gumarang and Sholarang passes connect the basin of the river Sutlej with its basin in Tibet. The Zanskar range is cut across by the river Sutlej through its spiti defile. There are many glaciers over the Zanskar range and great Himalayan range.

**RIVERS:**

The region abounds in rivers, lakes and glaciers. Due to the heavy rain fall that it receives in many areas and snow on high mountains it is rich in water resources.

These give rise to a large number of rivers and streams. Most of these are fed by vast reservoirs of glaciers and snow fields that are located in the upper tracts of the higher Himalayas. Most of the Himachal area is drained by the Indus river system that ultimately flows into the Arabian sea. Eastern Himachal Pradesh, on the other hand is drained by the Ganga system that enters the Bay of Bengal.  

The Eastern most river is the Yamuna river which rises in Yamnotri in the Garhwal (UP) Himalaya and forms the eastern boundry between Himachal and Uttar Pradesh. Its important tributaries are Tons, Pabar, Giri-Ganga. The Pabar river rises from Chander Nahan Lake on the Chanshal peak in Rohru tehsil and the Giri river from Kupar peak just above Jubbal town.  

The Sutlej, the largest among the rivers of Himachal Pradesh, originates beyond the Indian border on the southern slopes of the Kailash Mountain in Tibet. After flowing about 400 kilometres from Rakshtal, it enters Himachal Pradesh at Shipki. At the Zanskar and Great

Himalaya Crossing, the Sutlej receives the Spiti river from the north west. In Kinnaur it is joined by the Baspa river which rises from the southern Baspa hills. Just below Rampur Bushahr, it is joined by Nogli stream on the left side and by Kurpan rising from Srikhand peak on the right side. Flowing through Kinnaur, Shimla hills and Bilaspur district, it leaves Himachal to enter the plains of Punjab. At Tattapani in Karsog Tehsil of Mandi District there is an interesting hot water spring on the right bank of Sutlej river. The important settlements that occur along this river are Bilaspur, Suni, Rampur, Bhabnagar, Tshong-Tong, Pawari, Namgia.

The Beas which flows through the Kullu Valley and subsequently that of Kangra rises from the 3,978 metre high Rohtang Pass. It flows for about 256 kilometres in Himachal before debouching on to the plains at Mirthal. Its main tributaries in the east are the Parbati, Spin and Malang Nala and in the west Solang, Monalsu, Sujoin, Phojal and Saravari streams. At Bajaura, it enters Mandi district.

Mandi town is situated on its left bank. It enters Kangra valley at Sanchol. In Kangra district, it is joined by several other tributaries such as the Binwa Neogal, Banganga, Gej, Dehra, and Chakki from the north and Kunah and Man from South.

Ravi is one of the major tributaries of the river Indus. It rises in the Bara Banghal area of Kangra district in the tract bounded by the Pir Panjal range in the north and the Dhauladhar range in the south. Two main feeder streams merge to form the river Ravi.  

- The Bhadal that is fed by the glacier on the southern slopes of the Pir Panjal.

- The Tant Gari which also originates from the snow on the southern slopes of the Pir Panjal in the Bara Banghal area.

Thereafter the Ravi river flow towards the west along a "V"-shaped valley and enters Chamba district. After flowing for 130 kilometres through this region the Ravi finally leaves it at Kheri. Its left bank tributaries are not so important except one. The Chirchind Nala near Chhatrari which rises from the northern slopes of

Dhauladhar. The right bank tributaries are of considerable importance. Chamba town, the ancient capital of the princely state of Chamba, now headquarter of Chamba district is situated on the right bank of the river.

Important settlements along its course are Bharmaur, Chamba and Madhopur.

Chander Bhaga in Himachal Pradesh is the joint stream of the Chandra and Bhaga. Their origin is on the opposite sides of Bara Lacha. In Lahaul, Chandra and Bhaga flow as a joint stream (also known as Chenab) before entering Kashmir.

Most of the rivers of Himachal pradesh are snowfed. During the monsoons, they become raging torrents carrying enormous quantity of water.

In the low valley the major sources of irrigation water supply is the age old method of diverting water from the streams and rivers through Kuhls to cultivated fields. Timber is also floated on the rivers to the plains.
LAKES:

The hills and valleys of Himachal pradesh are dotted with beautiful lakes. Some of these lakes are sacred. Annual fairs are held on the bank of these lakes and brisk trade takes place.

The important lakes are Renuka lake in Sirmur, Rewalsar and Prasher lake in Mandi. Mani Mahesh lake in Chamba, Bhrigu lake in Kulu. Other lakes worth mentioning are:

- **Chamba**: Khajiyar lake and Mahakali lake.
- **Kangra**: Dal lake and Kaveri lake in the Dharamsala.
- **Mandi**: Kumarwah lake.
- **Kulu**: Dashahra near Manali, Sarel Sar near Jalori Pass.
- **Lahaul Spiti**: Chandertal and Surajtal.
- **Shimla**: Chander Nahan lake on the top of Chanshal peak in Rohru tehsil and Karali lake near the Shali peak.
- **Kinnaur**: Nako lake in Pooh sub Division of Kinnaur district.13

---

13. S.S. Negi, *Himachal Pradesh: The Land and People*, Delhi, 1993, p.120.
VALLEYS:

Valleys are prominent physiographic features of Himachal Pradesh. These are the cradle in which human civilization has flourished in this mountainous region. The people in early times migrated to these valleys in search of new land and pastures for their animals from the Indian plains and adjoining areas.

The prominent valleys of the region have been mentioned here with. Most of the valleys are river valleys.

The western most valley of Himachal is Chamba valley, drained by river Ravi. The valley as a whole, is fairly open.14

Kangra valley is an extensive dun type valley. Beas is the principal river of Kangra valley.

KULU VALLEY:

Kullu Valley begins at Ant on the Northern end of the gorge. The valley is 75 kilometers in length and about two to four kilometres in breadth and ends near the famous

Rohtang Pass, 25 kilometers north of Manali. It is drained by the river Beas and its tributaries. Hot water springs occur at various places much resorted to as places of pilgrimage.\textsuperscript{15}

The principal town of the valley is Kulu which is at a height of 1200 metres. It has a delightful and healthy climate and gets no snow fall.\textsuperscript{16}

Balh valley is also known as the Sunder nagar valley and lies in Mandi district. Its average elevation is 800 metres. Sukti stream, a tributary of Beas, the great benefactor of the valley divides it roughly into two parts.

Sutlej valley is the largest valley of Himachal Pradesh from Bilaspur to Shipki pass on the Indo-Tibetan Border in the north east.

Kiarda dun valley of Sirmaur lies between eastern extremities of Markanda and the Dharti ranges. It is also known as the Paonta valley after the town which lies in the valley. The Kiarda dun valley is formed by the Nahan ridge in the North and the Shwalik hills in the South.\textsuperscript{17}


\textsuperscript{17} \textit{Sirmaur State Gazetteer}, Lahore, 1939, p. 97.
Other lesser known valleys are Kunihar and Saproon in Solan region, Baspa valley in Kinnaur, Pin Valley in Spiti and Pangi valley in Chamba.\(^\text{18}\)

**SEASONS:**

Himachal Pradesh experiences three well defined seasons viz. summer from April to the end of June; Monsoon seasons from July to September; and winter from November to March. Spring is the transition period between winter and summer and that between monsoon and winter in autumn.

**CLIMATE:**

The climatic conditions here accordingly vary from the semitropical to the Semiarctic. The climate of Kangra valley, Beas Valley, Shiwalik area and Kiarda valley is severe in summer, and winter is pleasant and bracing with only a moderate variation between the day and night temperatures. Snowfall is rare. The climate in the mid Himalayan ranges of the Pradesh is pleasant in summer and very cold in winter and snowfall is heavy. In Lahaul Spiti

and Kinnaur valleys after December whole region is under snow till March or April. Communications remain cut off and the villages become almost isolated. In winter the inhabitants move to the Lower hills.

The distribution of rainfall varies from less than 500 mm in the greater part of Lahaul and most part of Spiti to over 3,400 mm at Dharamsala (Dhauladhar range).19 Kulu receives about 915 mm rainfall while Jogindernagar (Manali) less than 35 mm. of rain. About 70 percent of the annual rainfall is obtained during July to September, about 20 percent from October to March and 10 percent from April to June. Dharamsala receives the greatest amount of rainfall.

**FLORA AND FAUNA:**

Owing to the wide range of altitude and climatic conditions of the region it has diverse and rich flora.20 Natural vegetal cover here, is unique. Here we come across every type of pines, deodars, beaches and rhododendrons down to tropical shrubs and bamboo forests of low foot hills.21

The forest of Himachal Pradesh are classified into coniferous forests and broad leaved forests. Deodar, Kail, Chil, Spruce, Silver-fir and Neoza pine are the coniferous species growing in Himachal Pradesh forests. Coniferous woods provide excellent raw material for the manufacturing of a number of products. Neoza, Pine, which bears edible nuts, grows in Kinnaur district. There are the only forests of Neoza in India. Among the broad leaved species Sel, Ban Oak, Mohru Oak, Kharshu-Oak, Walnut, Maple, Bird cherry, Hourse nut, popular seemal, Tun and Shisham are the important species in these forests.

Perhaps no other region in India can boast of such variety of such fauna chiefly due to the different climates found in the tropical duns, the shiwaliks and other hills, long river basins and alpine hieghts. Other favouring causes are the comparatively large extent of terrain covered by forests and the measures for the protection of wild life by the Government.22 In Kulu Lahaul and Spiti, the brown and black bear, the spotted and white leopard, ibex, musk, deer, wild cat, flying squirrel, hyaena, wild pig, jackal, wolf, marten, marmot, wild goat and burral are found.23 Elephant and tiger were found in large number in the lower areas of lower region.

MINERALS:

Himachal is endowed with several important minerals such as lime stone, gypsum, barytes, magnesite, lead, rock salt, Silica, slate and pitch blend. Chinese travellers Huien Tsang 629-43 mentions his account that silver and copper is available in Kulu valley. Many travellers mention about Iron Ore in Navar of Rohru region in their accounts. Salt mines are found in Mandi. Slate mining is carried in Mandi, Chamba and Kangra State of Himachal Pradesh is useful only for roofing purpose. At Jwalamukhi temple jets of combustible gas have attracted people since long.