CHAPTER 2

Geographical Setting and Appraisal of Tourist Product Potential
CHAPTER 2

GEOGRAPHICAL SETTING AND APPRAISAL OF TOURIST PRODUCT POTENTIAL

Part I

Geographical Setting

The physical setting of Maharashtra is analysed below considering appropriate variables in brief.

2.1 GEOLOGY

The areally important features of terrain (landforms, drainage patterns, soils and slopes) are in fact the external expressions of the structure and lithology that lie underneath the region. The region is mostly covered by horizontal layers of basalt known as trap. The successive layers of lava are separated by ashes, limestone, sediments and other materials which are called inter-trappean beds. Near Mumbai the thickness of the trap is more than 2000 m. and gradually decreases to 4 m. at the outskirts of Nagpur in the east.

The older series of rocks belonging to Archaeozoic and Paleozoic epochs had been buried under the thick layers of basalt extruded during Cretaceous period over the extensive part of Maharashtra. The southern tip of this lava flow extends up to Kolhapur.

The Columnar joints occur at several places at Panhala hills (Kolhapur district) and near Vihar lakes (Near Mumbai), the stalagmites and stalagmites occur at Kanhur (Ahemadnagar). The meteoric lake with nearly round shape is situated near Lonar (Buldhana...
district), and huge volcanic cone is found at Mangitungi in Dhule district and at Kondhali in Nagpur district. These are some of the important geological features of considerable tourist interest are the expressions of geology of this region.

The second type of lithology is the vast area covered by older and recent alluvium is found in the Tapti-Purna basin (map 2.1) The new alluviums are found in the Wardha valley particularly in the lower reaches of the river system.

There are scattered patches of upper and lower Gondawana system are found in limited extent towards the eastern part of Maharashtra, particularly in Wardha and Nagpur districts.

The laterite comprises a group of small patches and are located in Yeotmal and Amravati districts. It is used as building materials. Mineral bearing older rocks are exposed on the surface in Chandrapur, Gadchiroli, Bhandara and eastern part of Nagpur districts.

2.2 HOT SPRINGS

The important hot mineral springs found in Maharashtra are at Khed, Unhala, Aravali, Tural, Rajwadi, Sangameshwar and Rajapur in Ratnagiri district, Unhere, Sov and Vadavali springs in Raigad district, Akloli and Ganeshpuri group of springs (Vajareshwari) in Thane district; Unabdev, Sunabdev and Najhardev in Jalgaon district and only one hot spring i.e. Salbardi in Amravati district. These springs could be developed with advantage as centres of nature cure therapy. (Map 2.2)

2.3 PHYSIOGRAPHY

Physiographically the Maharashtra State can be divided into the following well defined units i.e. (a) The Konkan lowland (b) The Sahyadri Mountains (c) The plateau region (d) The Satpuras and the Melghat (e) The Tapi-Purna Trough and (f) The Nagpur plain (Map 2.3)
2.3 (A) THE KONKAN LOWLAND

The Konkan lowland lies near the Arabian Sea. The length of the lowland is nearly 720 Km. from Dahanu in the north to Vengurla in the South. The breadth of this narrow belt varies from 45 to 100 km. and the altitude being 15 meters near the sea and increases towards the Sahyadri reaches to 250 meters.

It is a longitudinal narrow coastal strip of land that varies in width. Low relief and residual hills and undulating topography are the principle characteristics of this tract. The rivers originate on the slopes on the Sahyadris and plunge westwards into the Arabian sea. The Sea-coast is characterised by several inlets, creeks and estuaries of rivers. The Konkan area therefore is recognised as not a plain but low dissected plateau by Geographers.

2.3 (B) THE SAHYADRI MOUNTAINS

The Sahyadri Mountains were known to the Greeks as the "Bettigus" Mountains. They consist of highly eroded ranges running North-South, parallel to Arabian Sea. The average height is around 1300 m. The highest peak is Kalsubai (The highest peak in Maharashtra) reaches to the altitude of 1646m. from MSL. Flat topped plateau having cappings of laterite occurs throughout the region.

There are various saddles or passes are known as Ghats. The Thal Ghat and the Bhor Ghat are most important from communication point of view. Others ghats are steep. These ghats are in fact huge table lands of higher elevations. (Arunachalam 1976)

Some of the tourist centres are located on top of these Ghats. The forts such as Raigad, Pratapgarh and Sinhagad are built on altitudes of the Sahyadris. If looked from Konkan it gives resemblance of escarpment or a sheerwall. (Dixit 1986) This escarpment acts as a divide of major west flowing rivers.
2.3 (C) THE PLATEAU REGION

It is a rolling table land on high altitude occurring in the lee of the Sahyadris with a gentle slope due South and South-east. The Satpura range occupy northern boundary of this plateau region. The general alignment of the Satpura range is West-east.

The Plateau Region is traversed by three important offshoots of the Sahyadri Ranges. The Anjanta, the Balaghath and the Mahadeo ranges extend towards east like fingers of the open hand. These are the spurs or the tongues of the Sahyadi, decreases in height towards east. These ranges are having extensive flat topped areas on top of them. One offshoot of the Ajanta Range-Nirmal Range enters Parbhani and Nanded District of Marathwada. The Ajanta Range is also known as Buldhana plateau. The famous Daulatabad fort is located on this range. Mahabaleshwar-Panchagani and Ahmednagar are situated on the Mahadeo range and the Balaghath range respectively.

2.3 (D) THE SATPUDA AND THE MELGHAT

The Satpuda range forms the northern boundary of the Plateau region. The multiple ranges and sharp - crested ridges of the Satpuda occur in Dhule and Amravati districts. The average altitude of the tract is modest though considerable height of 1524 m. is reached at some places (i.e., Toranmal) and 1103 m. at Chikhaldara. The highest peak is the Astamba Dongar reaching to the height of 1325. The southern slopes of these ranges fall steeply from the height of 1200m to below 300 m. There are numerous cliffs and scarps which are believed to be due to faulting.

The maturely dissected plateau of Melghat lies in Satpuda. The highest peak Vairat (1145)m lies 11 Km. west of Chikhaldara. The Melghat plateau is highly dissected by its
drainage system. Thus this region forms alternate ridges and valleys. Flat top plateaus in limited extent are found scattered all over Melghat. Tiger Project and Gawilgad Fort is located in this tract. Thus the four fold barrier consisting of Vindhyas, The Narmada river, The Satpuda and Tapi river form a cultural divide that separates North India from Deccan.

2.3 (E) THE TAPI - PURNA TROUGH

The northern area flanked by the Satpudas to its north and the Deccan plateau to its south is an alluvium filled valley drained by the Tapi and its tributary Purna. The Tapi and the Purna valley are rift valleys, through which these rivers drained their water to the Arabian Sea.

The Purna - a rift valley occupy area between the Gawilgad and the Ajanta range. On the east the valley is bounded by a low lying spur which separates it from the wardha catchment area. The average altitude is 1050 feet.

The Tapi trough is contained between the satpudas and the Ajanta spur. The river flows due west and carved out broad fertile plain known for banana and cotton. The area drained by the middle Tapi and its tributaries is known as "Khandesh" and the one drained by the Purna - a tributary of Tapi - is known as Berar (Varhad.)

2.3 (F) THE NAGPUR PLAIN

The eastern part of Maharashtra is also a alluvial lowland below 400 m. drained by the Wardha-Wainganga- Pranhita rivers. The extreme eastern boundary of the state there occur a series of detached low hills or knolls about 500 m. in height.

The marked groups of hills are seen in the Nagpur plain. These hills are the erosional
remnants of the Satpuras. The Nagpur plain is having the maximum height of 350 m and minimum of 250 m. from MSL. Tadoba is located in this area.

2.4 DRAINAGE SYSTEMS

The state of Maharashtra is traversed by river systems draining into the Bay of Bengal and the Arabian Sea. There is concordant between underlying structure and drainage of the region. The streams and water divides are well adjusted to the structural features as is noted in direction of flow of the streams and the tilt of the Deccan plateau (Padhye 1963). The general direction of majority of rivers is towards east and south east. There is exception of the Tapi and its tributary the Purna since they are flowing towards the west through the rift valleys. The river systems of Maharashtra can be divided into five major systems .(Map.2.4)

2.4) (A) THE RIVERS OF THE KONKAN

The rivers of the Konkan are not significant in their length and catchment area as compared to rivers of Maharashtra plateau. They are swift flowing and short in length. They have their sources in the Western Ghats. Their length is between 50 km. to 155 km. They flow generally parallel to each other.

The most important streams of the northern Konkan are the Vaitarna, the Ulhas, the Savitri, the Vaishishiti, the Shastri and the Amba. The Ulhas with a course of 130 km. is the longest river of the Konkan coast. It rises in the ravines of Bhor Ghat and forms an amphitheatre like basin near Mumbai. The Damanganga, the Karli, the Kundalika are other important rivers in Konkan region.
2.4 (B) THE KRISHNA BHIMA SYSTEM

The Krishna rises at Mahableshwar in the Sahyadri ranges and flows about 282 km. in Maharashtra. It is a holy river of Maharashtra next to the Godavari. The Koyna, the Varna and the Panchaganga are the major tributaries of Krishna river.

The Bhima river rises at Bhimashankar in the Sahyadri ranges and flows for 451 km. in Maharashtra and meets the Krishna in Karnataka. The Sina, the Nira, the Man and the Ghod are the major tributaries of Bhima. It is a holy river of Maharashtra. The most important religious centre of Maharashtra i.e. Pandharpur is located on the right bank of this river.

2.4 (C) THE GODAVARI SYSTEM

The Godavari is one of the main river systems of Maharashtra having the length of about 668 km. It has its source at Tryambakeshwar (Sahyadri ranges) in Nashik district. It is always called the Ganga of the south. The Purna, the Dudhana, the Pravara, and the Sindhaphana are the major tributaries of Godavari. The Manjara is also important tributary of Godavari which meets it in Andhra Pradesh. It is a legendary river.

2.4(D) THE TAPI-PURNA SYSTEM

The Tapi is major river of north Maharashtra which flows towards West. It has a length of about 208 km. The Purna is the important tributary of the Tapi which also drains Varad region. Both of them have their sources in Betul district of Madhya Pradesh.

The river Narmada has marked the northern boundary of Dhule district for about 54 km. though it seems that Narmada is not important river of Maharashtra plateau. The catchment area of the Narmada in Maharashtra is very less.
2.4 (E) THE WARDHA SYSTEM

The Wardha river has its source in the hills of Madhya Pradesh and flows first to the south and then south-east direction. The Painganga and the Jam are the major tributaries of the Wardha river, it meets the Wainganga in Chandrapur district. In Maharashtra the Wardha has the 21645 sq. km. catchment area. The catchment area spreads in Nagpur, Amravati, Wardha, Akola and Yeotmal district.

The Wainganga has also its source in the Mahadeo hills in Madhya Pradesh and flows towards south to meet the Wardha. It has the length of about 295 km. The most important feature of these rivers is that they are flooded in Monsoon and become dry in summer season. The Godavari, the Narmada and the Tapi are perennial and others are non-perennial rivers.

2.5 CLIMATE

The climate of Maharashtra is of typical Monsoon type and enjoys three seasons. i.e. The cold weather seasons, summer season and the season of general rain. March, April and May are the summer months. May is the hottest month in Maharashtra. June, July, August, September are the Monsoon months. October being transitional between rainy and winter season. December, January and February are the winter months.

2.5 (A) THE COLD WEATHER SEASON

The cold weather season (Winter Season) starts early in November and lasts upto February. Clear skies, fine weather, light northerly winds, low humidity and temperature, cool weather and large daytime variations of temperature are the normal features of the
weather in Maharashtra from November to February. The lowest temperature is recorded in
the month of January. Due to the cold waves from northern side temperature decreases
rapidly in North-West Maharashtra. Minimum temperature recorded in Maharashtra is at
Mahabaleshwar and Chikhaldra. But the weather is generally pleasant in Maharashtra during
this season.

2.5 (B) SUMMER SEASON

In the hot weather which may be said to begin from March, there is a appreciable
rise in the temperature and decrease of Barometric pressure in Maharashtra due to the
northward march of the sun. During the hot weather month March to May local sea breezes
prevail in the coastal districts of Ratnagiri, Raigad, Mumbai and Thane and dry land winds
in the interior i.e. east of Sahyadris. Hence temperature is highest in the interior and there is
a large contrast of temperatures between the interior and coastal districts. The highest
temperature is recorded at Nagpur.

2.5(C) THE SEASON OF GENERAL RAIN

As the temperature rises in the interior parts of India low pressure belt is created,
because of this low pressure belt over north west India and a secondary low pressure belt is
generated in the Tapi-Narmada basins and the high pressure over the Arabian Sea. The flow
of winds from the sea to the land is initiated which is called the southwest monsoon winds
. Generally the southwest monsoon starts from June in Maharashtra. Monsoon enters in
Maharashtra through Konkan. Then it gradually progresses towards east and extends all
over Maharashtra. October is the month of transitional conditions of dry winter season. The
change in atmospheric conditions begins in early October.,
2.5 (D) RAINFALL:

There is a great variation in seasonal distribution of rainfall in Maharashtra. The months of November, December, January and February are almost dry. In the month of April and May Maharashtra receives pre-monsoonal rainfall in the form of cyclonic storms. The period of heavy rainfall is generally from June to October. The rainfall reception in Maharashtra largely confined to this five months period. Owing largely to the summer monsoon though some rain is received during retreat of southwest monsoon associated with cyclonic storms in early winter.

There is also a great variation in spatial distribution of rainfall in Maharashtra. The Konkan coast receives the average annual rainfall of 250 to 350 cm. The highest rainfall is received at the crest of the main range of Sahyadris (Mahabaleshwar 622.6 cm., Igatpuri 351.1 cm., Lonavala 430.6 cm., Khandala 470.1 cm. and Amboli 747.7 cm.). This rainfall is of orographic origin. It decreases rapidly towards the east of Sahyadris because this area comes under rainshadow zone. Panchgani receives only 186.5 cm. rainfall which is only 15 km. east of Mahabaleshwar. Karad receives 71.3 cm. rainfall which is further east of Panchgani. Thus, Nasik 83.4 cm. Junner 74.2 cm. Wai 71.0 cm. all occur in the rainshadow of the Sahyadri and not far from its crest receive less amount of rainfall. The driest part lie in a north-south belt passing over Ahemadnager 57.1 cm., Baramati 46.5 cm., Daund, Sangli 56.1cm., Jejuri, Dhule 60.8 cm., Solapur 74.2 and Pune also occurs in rainshadow zone, known as drought prone area of Maharashtra.

As we go towards east the amount of rainfall increases. Because of the Bay current the rainfall in the eastern Vidarbha increases. Thus, Bhandara, Chandrapur and Gadchiroli districts receive the annual rainfall of about 145 cm. Because of hilly terrain the rainfall
increases at Chikhaldra (170.8 cm.)

From the above description the state of Maharashtra can be divided into three zones based on distribution of rainfall.

1) Humid 2) Semi-Humid and 3) Semi-arid. (Map 2.5)

2.6 NATURAL VEGETATION AND FORESTS

Maharashtra was covered with dense natural vegetation in ancient and medieval period. Hills, mountains and river valleys were covered by the dense forests. But today the condition is reversed regarding the natural vegetation. As the population grew, the number and size of settlements grew and ultimately the forest area shrunk giving way to agricultural land. The Virgin eco-system of vegetation was destroyed for various uses i.e. fuel, construction of houses, for cultivable land and agricultural implements etc. Today forests cover about 20% of the total area and of remaining area about 80% is under cultivation and other uses. In many parts the human interference has reduced the extent of forests and damaged their quality. However forests presently survives in some remote areas of Maharashtra. The natural vegetation of Maharashtra can be divided into following types: (Map 2.6)

2.6 (A) TROPICAL WET EVERGREEN

This type of forest is found on the western slopes of Sahyadri particularly in the vicinity of Sawantwadi in Sindhudurg district. Here high rainfall, high humidity and high humus content in wet soil have resulted in dense tall evergreen forest. The forests are not only dense but they are characterised by occurrence of luxuriant flora i.e. teak, Bamboos and Liana etc. These are hardwood forest with a dense under growth.
theless, these are important from scenic point of view. But these are being destroyed by the people rapidly.

2.6 (B) TROPICAL SEMI-EVERGREEN

This type of forest occurs in the transitional zone between evergreen and humid deciduous forest. It is found on the western slopes of Sahyadri where the annual rainfall is about 300 cm. The forests in the vicinity of Igatpuri, Lonaivala and Amboli are representatives of this type of forest which have tall evergreen trees mingled with few deciduous trees.

2.6 (C) TROPICAL MOIST DECIDUOUS

This type is found in the area where the annual rainfall is approximately 130 cm. and a well defined dry season occurs during the summer season. These forests are found particularly in Chandrapur district followed by Gadchiroli and some part of Bhandara district, Melghat, and on the slope of Sahyadri. Trees are generally tall. Usually tropical moist deciduous trees are found with some occurrences of evergreen forest. Teak is the most important tree of this type. Other trees like Shishum, Mahua, Bamboo and Acacias are also found.

2.6 (D) TROPICAL DRY DECIDUOUS

This type of forest is found in the areas where the annual rainfall is around 120 cm., long dry period and poor soils. Satpudas and Ajanta hills is an important belt for this type of forest along with some hilly regions of Vidarbha and drier part of east of Sahyadri. Typical tall deciduous trees are found along courses of river.
2.6(E) TROPICAL THORN:

This type of forest is found in the middle part of Maharashtra. There are belts of dry thorn bushes along the slopes of hills. Pune-Daund region is the representative of this type. The foothill zones in Marathwada and Vidarbha are covered by this type of vegetation.

The scanty and uncertain rains, rocky and infertile land have resulted in the short and thin vegetation cover. Here mostly the trees which can survive in the drier climate are found. Accacia is an important tree of the forest. Neem is present everywhere. Besides this, Rosha grass, Kusal, Dunda, and Sukalgrass occur in certain areas. Because of local varied climatic conditions various species of trees are found at certain places.

In a hilly region around Mahabaleshwar, Panchagani, Matheran and Bhimashankar the temperate broad leaved trees are found. Plenty of rainfall, relatively low temperature, extended rainy season, relatively high humidity and fertile soil have resulted into the growth of evergreen forest.
Part II

Cultural Setting

2.7 POPULATION DISTRIBUTION

Regarding the spatial distribution of population in Maharashtra it is seen that a large part occurs in the upland areas. The regionwise distribution is indicated in table 2.1

Regionwise percentage of Total and Urban population (Year 1991)

Table 2.1

<table>
<thead>
<tr>
<th>Region</th>
<th>% of population</th>
<th>% of urban population</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Konkan</td>
<td>24.53</td>
<td>45.32</td>
</tr>
<tr>
<td>2. Upland districts</td>
<td>29.95</td>
<td>23.73</td>
</tr>
<tr>
<td>of western Maharashtra</td>
<td></td>
<td></td>
</tr>
<tr>
<td>3. Khandesh</td>
<td>7.25</td>
<td>4.57</td>
</tr>
<tr>
<td>4. Marathwada</td>
<td>16.22</td>
<td>9.18</td>
</tr>
<tr>
<td>5. Vidarbha</td>
<td>22.05</td>
<td>17.20</td>
</tr>
<tr>
<td>Total</td>
<td>100%</td>
<td>100%</td>
</tr>
</tbody>
</table>

It is clear from the table that 1/4 of the total population occurs in Konkan. As is well known, a large part of the population is concentrated in Mumbai and Thane districts. The remaining areas are characterised by low population densities.

The upland districts of Western Maharashtra share 29.95% of the total state population
A large part of it occurs in the tract between Poona, Kolhapur and Sangli. Irrigated areas carry relatively higher concentration of population leaving remaining vast areas with less people.

Khandesh region consisting of two districts, Dhule and Jalgaon, reveals concentration of population largely along highways and railways. The northern hilly tract and the southern undulating area has sparse population. The share of Marathwada is 16.22% and the distribution of population seems to be concentrated along Aurangabad Nanded axis with isolated pockets in Latur and Udgir.

Vidarbha with about 22.05% of the total population along highways and railways network. The Northern hilly area and the eastern and south eastern hilly and forested tracts are sparsely populated. (Map 2.7)

2.8 DENSITY OF POPULATION

The density of population in Maharashtra State as revealed from the results of the 1981 and 1991 censuses has gone up to 257 persons per sq. km as against 204 persons in 1981. The density of population in the state is low compared to that of India. (267) In respect of density of population, the State ranks twelfth among all the States in India as per the 1991 census. According to the 1981 census, Mumbai district enjoyed the highest density of population (13644 persons per sq. km.)

Thane ranks second Kolhapur and Pune districts record densities of 250 and 350 persons per sq. km, respectively. The rest of the areas are characterised by fairly low density indices.

The density of population of Maharashtra is highest in the district of Mumbai i.e. 16432 persons per sq. km. (census 1991). Other districts having density of population above the
state average are, Thane (549 persons), Kolhapur (392 persons), Pune (354 persons), Nagpur (331 persons), Jalgaon (271 persons) and Sangali (259 persons).

The districts somewhat sparsely populated are Gadchiroli (51 persons) and Yeotmal (153 persons). The basins of Krishna and Bhima, despite the inclusion of Sahyadri and rugged "Mawal" in their fold are the most populous. Fairly higher rainfall amount and the deep black fertile alluvium soils of the river valleys have attracted more people. Solapur, Pune, Kolhapur triangle is the most densely populated core of the region. Because of paucity of rainfall in the drought prone areas, the density is less in eastern parts of Pune, Satara, Sangali, Kolhapur, Ahmadnager and Solapur. The district of Thane is densely populated because of concentration of large population in Mumbai metropolitan region and near by cities located along the main railway routes and highway emanating from Mumbai. The next populous region is the Tapi-Valley i.e. Dhule and Jalgaon districts that produces commercial crops as Banana, Hybrid Jowar, Chillis and Cotton. Chandrapur Gadchiroli region is the least populated because of hilly terrain, heavy rainfall, occurrence of forest and lack of economic development. (Map 2.8)

2.9 LITERACY

In 1991, the percentage of literates to the total population has gone up to 64.9% as against 47.02 in 1981. Maharashtra state ranks fifth in respect of literacy amongst all the states in India in 1991.

The literacy rate in the rural areas is much lower (37.97%) compared to the rate in urban areas (63.82% 1981) Sindhudurg, Ratnagiri district with the literacy percentage 75.81 leads in the state, followed by Mumbai (71.55). Nagpur (73.64). Pune (71.05) and
Amravati (70.06). The lowest literacy percentage has been recorded in Gadchiroli district (42.95) followed by Jalna (46.25), Parbhani (47.58), and Beed (49.82). The remaining districts fall between 50 and 70 percent.

Ratnagiri district ranks first in urban literacy i.e. 69% followed by Mumbai, Satarā, Wardha, Raigad, Thane and Nagpur, which have above 60% literate population. The lowest literacy for the urban areas is found in Parbhani district i.e. 28.11%. Regarding the rural population, Amravati leads in the percentage of rural literate population (47.36%) and Nanded is the lowest in rural literacy (25.26% 1991) (map 2.9)

2.10 URBANIZATION

According to the 1991 census the urban population in Maharashtra was 38.7 percent of the total population. In this regard Maharashtra stands fourth amongst all the states in India. The proportion of urban population has been continuously increasing in the last three decades. The number of cities and towns in Maharashtra increased from 307 in 1981 to 336 in 1991. It has increased considerably over past few decades due to increase in the industrialization of Mumbai-Pune tract and other corners in their city region. Over 50% of the total urban population occurs in the three districts of Mumbai, Thane and Pune.

Amongst the districts of the State, Mumbai has 100% population in the urban category. Other districts which are above the States average of urban population are Thane (64.64%), Pune (50.74%) and Nagpur (61.75%). Sindhudurg district has the lowest percentage of urban population (8.43%). Other districts with low percentage of urban population are Gadchiroli (8.78), Ratnagiri (8.93), Satara (12.89), Bhandara (13.09) Osmanabad (15.20). (Map 2.10)
In all there are 336 urban centres, out of which 33 are Class I, 30 Class II, 114 Class III, 102 Class IV, 46 Class Vth and 11 Class VI th towns (census 1991)

Mumbai is a leading metropolitan centre having population of 9908547 p. followed by Pune (U.A.) 2444020, Nagpur (U.A.)1657135, Nasik (U.A) 723669, Aurangabad 572550 and Kolhapur (U.A.) 417286. There are two super cities which have the population more than 5 lakhs and less than 10 lakhs viz Solapur and Ulhasnagar. 71.55% of the total urban population of Maharashtra occurs in Class I cities (population more than 1 lakh)

The remaning segment of 28.45% of urban population occurs in the lower order centres. The map 2.10(b) vividly reveals the facts of concentration of urban population occuring mainly in the Mumbai-Pune tract and Nagpur. (Map 2.11)

2.11 SEX RATIO

The Sex ratio in the State is generally weighted in favour of males. There are 936 females per thousand males in 1991 as against 938 in 1981.

In urbanized setting of Mumbai and Thane the Sex ratio is 733 and 883 respectively. This is probably because of the large influx of male working population to the industries of these districts. There are three districts in Maharashtra namely Raigad, Ratnagiri, and Satara in which the sex ratio is favorable to females, because of the exodus of the male working population to the adjoining industrial districts. In many districts the number of females per thousand males has increased compared to that of 1971. In the cities and urban agglomerations of size. Class I, the Sex ratio is generally much lower than the state ratio, with the exception of Malegaon (Nasik district) Jalna and Gondia. (Map 2.12)
2.12 TRANSPORT AND COMMUNICATION

Maharashtra has a well developed systems of highways and railways converging on Mumbai. Mumbai is the hub of international, national air routes and sea routes. The first railway started in 1853 from Mumbai to Thane. Today the total length of railway in Maharashtra is 5459 km. Out of which 3605 km. (66 percent) is covered under broad guage, 754 km. (14 percent) under meter guage and 1100 km. (20 percent) under narrow guage.

Mumbai is linked with all leading centres of the country by railway. Mumbai to Chennai Via Pune, Mumbai to Delhi Via Ahmadabad, Mumbai to Nagpur etc. are the principal railway routes radiating from Mumbai.

The road systems consists of National highways, State highways, Major district roads, other district roads and rural roads. Maharashtra has 2949 km. National highways, 31772 km. State highways, 39819 other district roads and 63123 village roads. (Economic survey of Maharashtra 1994-95). The roads are more important than the railways and airways in Maharashtra in handling the passanger and goods traffic in the state, because roads construction is cheaper than laying railway lines. Roads have been built (including fair weather roads) under the district and state plans of development and therefore, they are very important in circulation of people and goods. Mumbai is linked with the leading centres of the country by highways, Mumbai to Agra, Mumbai to Bangalore via Pune, Mumbai to Chennai via Pune, and Mumbai to Nagpur etc.

The irregular terrain have affected the mode of transportation in the interior of Maharashtra. The interspaced regions between the system of highways and railways have lagged behind in economic development and therefore, they do not have efficient
transportation link. The hilly and forested areas of the state are also characterised by poor networks of roads and no railways.

However, the road network is not evenly distributed all over the state. The underdeveloped areas of middle Godavari valley, the Satpura area of Dhule and Amravati, parts of Western Ghats and forested lower Wainganga basin are still inadequately served by roads network resulting in poor accessibility. The Western Maharashtra is better served by road networks resulting in relatively higher accessibility (Map 2.13).

In Maharashtra the Arabian Sea is important from the point of view of sea transport. Mumbai is the most important port not only in Maharashtra but also in India. All other ports are complementary to Mumbai. There are several sea ports as Dabhol, Ratnagiri, Vijaydurg, Malvan and Vengurla and coastal traffic moves between them and to Mumbai. The rivers are not so important from the point of view of inland transportation.

During the past four decades the air transportation has become an important media of transport. Mumbai’s Santacruz and Sahar air-ports are of international importance. They are connected with the cities in Maharashtra like Nagpur, Pune and Aurangabad. Mumbai is linked with other cities in India by Mumbai to Cochin, Mumbai to Bangalore, Mumbai to Chennai, Mumbai to Calcutta, Mumbai to Indore and Bhopal and Mumbai to Delhi, Mumbai to Akola and Amravati. Nagpur is connected by air with other cities in India due to its central location. (Map 2.14)

The following broad cultural regions of Maharashtra may be identified on the basis of discussion of physical and cultural aspects given in the preceding pages. The Konkan, Western districts of upland Maharashtra, Khandesh, Marathwada and Vidarbha, have physical and cultural personalities of their own.
2.13 APPRAISAL OF TOURIST PRODUCT POTENTIAL

An appraisal of the tourist potential of various cultural regions would be helpful in understanding its possibilities in future. A brief resume given in the following pages, confirms to this perspective. It will also help to check the extent of possibilities exists and how far this potential has been exploited till today.

2.13 (A) KONKAN

The cultural region of Konkan is a longitudinal coastal strip of land varying in width and bounded by the Arabian sea towards east. The Konkan is characterised by small east-west flowing streams, hot springs, spurs, bluffs, several creeks, sandbars and bays. The hot and humid tropical climate and heavy seasonal precipitation during the monsoon season support bush green vegetation. Konkan, thus offers a wide range of spots for tourists in the form of swinging safari of surf, sun-shine and seclusion.

The beautiful sandy beaches as those at Ganapatipule and Malvan, warm climate during the winter season, so useful for tourists from cold countries, historical forts built on beautiful islands (i.e. "Jezirah" as Murud Janjira) and on dykes as Sindhudurg, exquisite panoramas as can be watched from the fort of Raigad, spots of seclusion and special bird and animal life constitute the tourist potential of this tract. Along the north-south oriented coastal tract between the sea and the western Ghats, there are three well-known groups of hot mineral springs occurring in the three districts of Konkan: (Unhere, Sav and Vadavali, Khed, Unhala, Araval, Rajawadi, Sangameshwar and Rajapur springs.)

Important beaches are Malvan, Janjira-Murud, Ratnagiri, Ganapatipule, Vengurla, Borivali, Erangal beach, Juhu beach and Alibag beach.
There are some important forts in Konkan, Arnala, Raigad, Sindhudurg, Janjira and Gheria forts. Panoramas occur along the eastern margin of Konkan characterised by deep valleys, thick forests and Ghost hills of Western Ghats.

Bird sanctuaries, abounding in bird and animal life (Arnala), possibilities of fishing as a sport, constitute its potential. Mumbai city and its environs provide additional centres of tourist interest. Spots of seclusion occur along creeks throughout Konkan. It may be recorded here that the Konkan region considered to be an economically poor tract is thus rich in tourist potential from all the perspectives.

2.13 (B) WESTERN DISTRICTS OF UPLAND MAHARASHTRA

Geographical settings of this cultural region is characterised by the Sahyadri Mountains towards west with their eastward and south-ea toward projected spurs which form a water divide between the main river valleys of this area. The lofty mesas in Sahyadris juxtaposed by abysmal passes furnished excellent sites for building forts during the historic past. The amount of annual precipitation is very high in the Ghats and declines eastwards which is directly reflected in the type of natural vegetation. This area enjoys the facility of road and railway linkages and various tourist centres are accessible from Pune city. Ancient urban centres of the "Deccan Corridor" of cultural diffusion of Indus valley civilization occur in this tract viz. Nasik, Nevasa, Jorwe, Prakashe etc. The contrasting panoramas presented by the Sahyadris during the wet and the dry seasons are simply picturesque. The historical hill forts as those of Vishalgad, Sinhagad, Panhala, Rajgad, Lohgad, Ajinkyatara, Saler, Muller, Parli, Tryambak, Bawada and many others in Ghat section are known for historical importance, medieval architecture, panoramas and solitude. Buddhist caves as at Karla, Bhaja, Bedsa etc. are also important tourist centres. Many of the high spots in the
Ghat section hold potential for developing hill stations. Lonavala, Khandala, Matheran and Mahabaleshwar are the developed hill stations. Other spots could also be developed on the same line in future. The hilly and the forested areas of the Western Ghats hold immense potential for utilization as areas for hunting as a sports, photography, rock climbing and mountaineering. Since this area has a number of artificial lakes it holds considerable potential for development of fishing and boating as sports and boating races e.g. at Shivsagar lake, Bhandardara lake, Radhanagari lake, Bhatghar lake, Panshet, Mulshi lake, Gangapur lake and the new lake near Daund etc.

2.13 (C) KHANDESH

This area identifies with the fertile middle Tapi valley, which is flanked by the fringe of Satpudas mountains in the north and the Ajanta spur towards south. The tract enjoys a hot and drier type of climate. The Satpudas contain some picturesque spots, Toranmal a hill station, Pal a health resort and the hot springs in the piedmont zone. Hot springs known as Unabdev, Sunabdev and Najhardev near Chopra occurs in the Jalgaon district. The Satpura mountains are covered by deciduous forests and are suitable for hunting sport.

The study of tribal life of the Bhils and Korkus is possible in the Satpudas near the banks of Narmada river in Dhadgaon Tahsil. Jalgaon and Dhule are two important centres of Khandesh. The only drawback is of inaccessibility factor which alone has probably been largely responsible for arresting growth of tourism in this area.

2.13 (D) MARATHWADA

The portion of the Godavari Valley, contained between the Ajanta spur towards north and the Harischandra-Balaghat range towards south has spread in the seven district
of Marathwada (Aurangabad, Parbhani, Nanded, Beed, Osmanabad, Latur and Jalna)
The region is also recognised as the land of saints and shrines. The Ajanta group of World
famous caves occur along the ancient highway in the Ajanta hills. These groups of caves
situated at Ajanta, Ellora, Pitalkhora etc. belong to Buddhist, Jain and Hindu religion and
heritage.

Paieth, Nanded, Parli-Vaijnath, Aundhmanagnath, Grishneshwar and Tuljapur are the
places of religious interest in this area. Aurangabad, Udgir and Nanded are important from
historical point of view. There are some important forts, such as Daulatabad and Kandhar
and Paranda Forest occurs in Kinwat, Hadgaon and Bhokar tahsils could be used for
photography and hunting. Aurangabad is linked by highways and air-routes with Mumbai
and Delhi.

2.13 (E) VIDARBHA

The sizeable area of Vidarbha occurs to the south of Satpura and is drained by
the Purna, the Wardha, the Wainganga, and the Pranhita systems of rivers. The climate of
Satpura mountains is moderate and supports thick deciduous natural vegetation. The area
contains the famous hill station of Chikhaldha. This mountain range contains several high
spots for development as hill stations. The thickly forested area could be used for hunting
sports, photography and trekking. It is settled by the typical Korku tribals and they offer an
opportunity for anthropological study. Typical tribal settlements of the Gonds occur in
Sironcha and Gadchiroli. The area is also characterised by thick forests useful for hunting
and photography. Cultural centres as Sevagram, Wardha and Paunar are associated with the
life of Mahatma Gandhi and Vinoba Bhave. At Saibardi hot and cold mineral springs,
Tadoba game sanctuary, Kolkhas and Bor wildlife sanctuaries and Newegon National Park, too occur in this tract. Amravati, Ramtek, Kauadanayapur and Shegaon are important religious places. Some of the places of historic importance are Shindkhed Raja Gawilgad fort, Achalpur fort, Bailapur and Gadchiroli. The important cities of the region are Nagpur, Amravati and Akola.
References


