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FOREST RESOURCE IN MUNGER DIVISION

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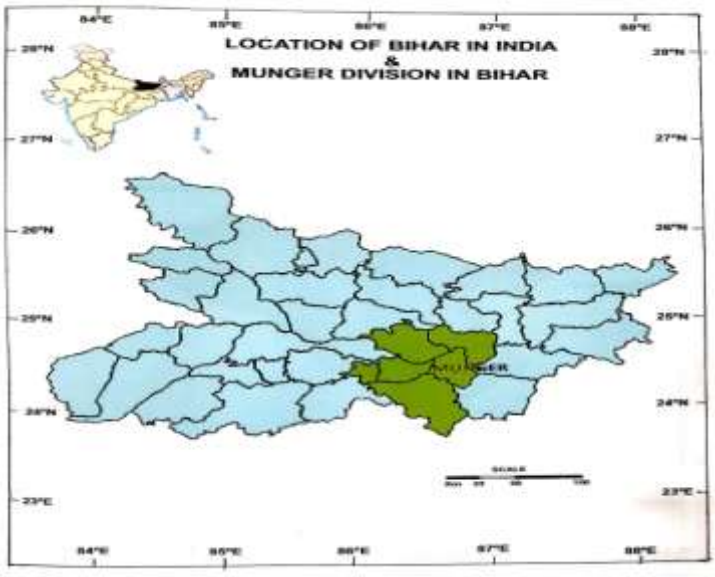
Introduction

Forest is the greatest renewable natural resource and one of the most striking features of the landscape. The importance of the use of forest resource and its conservation has been admitted all through the ages and men have made extensive use of it for their comfort and luxury. It has shaped the economy of the division of Munger and increased human consumption by providing raw materials which are needed most by our industries.

No one can deny the importance of forest in the regional ecology as well as in the economy. A vast wealth is hidden in the thick forest because it provides men with essential commodities like fuel, medicinal herb, different kinds of fruits. Forest plays a vital role in arresting the monsoon rains. Where there is forest there is a plenty of rains and this it helps the land to grow more food for mankind.

In the modern age it has been considered to be the laboratory of modern workshop and development of fodder resources. Various types of natural resources are in abundance in the forest region.

The existence and expansion of forests constitute one of the primary determinates of a healthy ecology for man. Our ancestors intuitively understood the importance of forest in maintaining the optimum ecological balance. Such altitude towards tree can certainly ensure the durability of our species.



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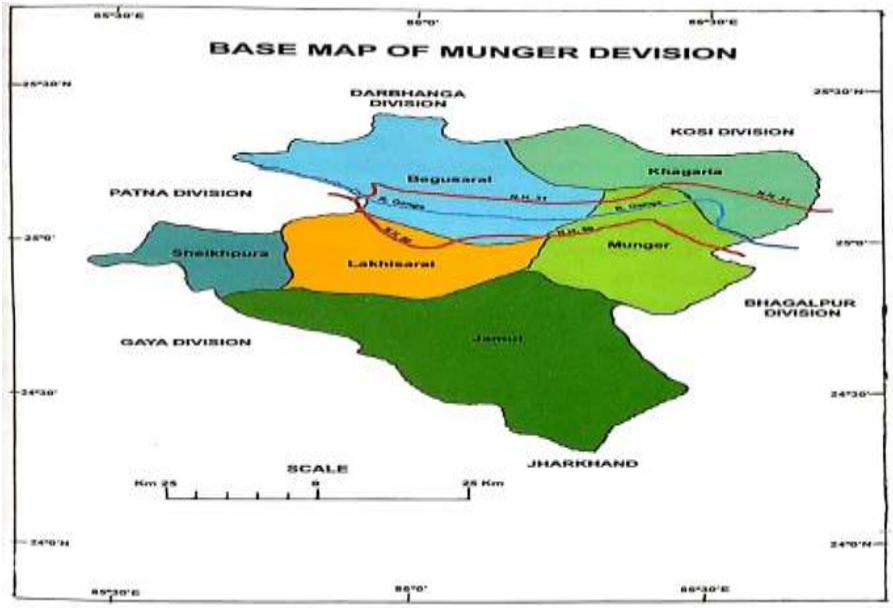
GEOGRAPHICAL BACKGROUND

In fact, forests are the soul of our environment by virtue of their performance in amelioration and maintenance of involvement. The influences of forests over involvement is not merely limited to the forest boundary but beyond. It provides numerous socio-economic and cultural contributions to the society in economic and cultural contributions to the society in economic development. With the development of science and technology, social and cultural environment like transport and communication, trade and commerce, industries, agriculture and settlement patterns also expert great influence upon the distribution and density of mankind in any part of the world. It is therefore quite necessary to gain primary information regarding physical, social, cultural and economic aspects of the study region.

Munger division is one of the nine divisions of Bihar. It consists of six districts Munger, Khagaria, Begusarai, Lakhisarai, Sheikhpura and Jamui. Out of six districtstwo districts lies in the northern part of the river Ganga and the rest four districts lies in the southern part of the river. In other words, river Ganga divides the district in two halves. The river also demarks the lithology too.

The study area covers total geographical area of 9838 square kilometers and has 9362742 persons as populations in 2011. It lies between 24°22' N latitude to 25°30'N latitude and 86°30' E to 87°30' E. Its headquarter is located in the southern bank of river Ganga in Munger districts. This division is bounded by Bhagalpur division in East, Kosi and Darbanga division in North. Patna and Magadh division in West and Jharkhand state in the South.



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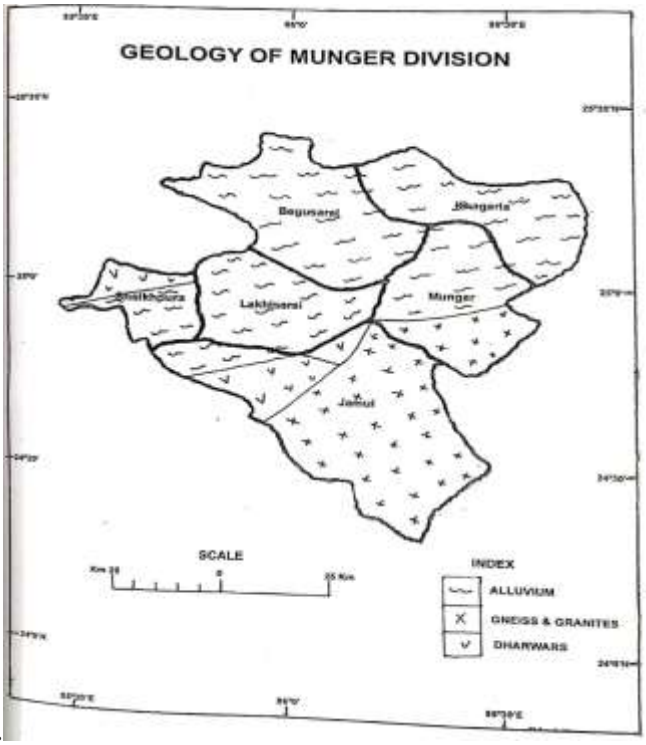
GEOLOGY AND RELIEF

Geologically the study is very unique. As it is a part of Bihar, it is not totally made by the alluvial plain as the maximum parts of the state. Map depicts the situation of physiographic conditions.

It is clear from the map that Begusarai, Khagaria, northern part of Munger and Lakhisarai is a part of active alluvial plain where the river Ganga and its tributaries brought down alluvial soil regularly; part of Begusarai and Lakhisarai is made of recent alluvial soil. Major part of Jamui districts, parts of Lakhisarai and part of Munger is a part of Chotanagpur plateau. Slopwise parts of Begurai, Khagaria and Lakhisarai districts in the north of river Ganga have an elevation of 50 meters above the mean sea level whereas in the south of Ganga the elevation of slopes in the other districts rises gradually.

Highest elevation found in Kharagpur hills in Munger district and Gidhaur hills in Jamui district with 150-300 meters per kilometres from the sea level. In the western boundary of Jamui district Batiah hills is the highest part of the Munger division with 300-600 meters per kilometres from the mean sea southern Munger division.



Geologically our study region is also interesting as it has different lithological qualities. Begusarai, Khagaria part of Munger, Jamui and Lakhisarai has recent alluvium made during quaternary period. Where the rest part of the districts have geological formation of Archaean and Cambrian periods. Formation of alluvial has clay, silt, gravel, pebbles and calcareous concentration. The hilly part of Dharwar system formed with slate, granite, schists and gneiss and the plateau regions are made of unclassified granite and gneisses.

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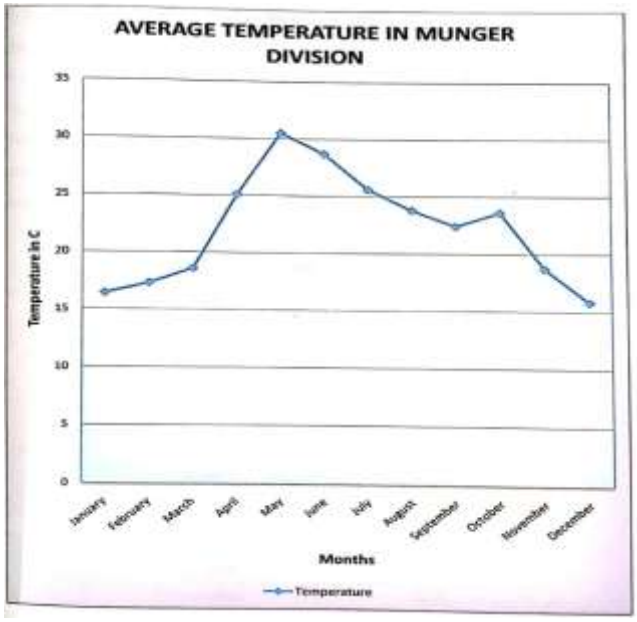
a. **Plains**: The study area is divided into two parts with river Ganga. North part of the division is a part of Gandak and Kosi plain.

b. **Tal region**: This region is a saucer shaped low lying area existing south of the higher level of the river Ganga, west of Kiul plain having relatively higher land. This region forms a vast expense of water body during the rainy season and spreads in the districts of Sheikhpura.

c. **The Munger hilly region**: The hilly terrain of Jamui and Munger lie in the Southern portion of Bihar. Certain part of these gills touches the river Ganga. This hilly region comprises a number of low ranges and isolated peaks. The most extensive range is known as Kharagpur hills which form an irregular triangular block extending from near Jamalpur to the Jamui railway station.

d. **Climate**: Climate is one of the important determinates of the geographical personality of an area. The region under study is situated in the alluvial and hilly tract of the state and has an agricultural base. Hence climate specially the amount of rainfall has played a very important role in shaping the cultural landscape, human activities and the entire economy of the region (Dayal 2002).

Temperature, rainfall, humidity, pressure and winds are the elements of the climate. These are not evenly distributed throughout the year. They vary from month to month and season to season. The table shows the distribution of temperature in Munger division.



AVERAGE TEMPERATURE IN MUNGER DIVISION

Months	Temperature in °C Munger Division
January	16.4
February	17.3
March	18.6
April	25.1
May	30.5
June	28.7
July	25.6
August	23.8
September	22.4
October	23.6
November	18.7
December	15.8

Source: Directorate of Economic and Statistics, Patna, Bihar.

Above table shows the distribution of temperature in Munger Division.

Drainage: Drainage system considers the life supporting system of any region as it provides water for survival of life. Bihar is famous for numerous river systems. Munger division has the Sakri, the Kiul, and the Chandan river system.

The Kiul River: The principle river to the south of the Ganga is the Kiul. It rises in the Kharagdihathana of Heyuribag and after forming the boundary of that district for a short distance enters Munger through a narrow gorge near the Sutpahari hill. It runs first eastward close to the southern face of the Gideshwar hills, but turns northward at their eastern extremely and passes one mile east of the town Jamui.

Soil: Soil is a resource whose formation is wholly dependent upon the nature of original rocks, slope and relief, geological cycle, climate, vegetation and other living organisms. Soils of the south Bihar plain reveal some contrasting quality than that of the north Bihar plain. Parent materials of the north Bihar plain are mostly quartzite, sand stone etc. while the parent material of the soil of south Bihar plain are granite, gneiss, schist etc.
Therefore major types of soils are of four in numbers -

1. **Old alluvial soil**: This type of soil corresponds to clayey loam and kewal soils. This soil is mostly found in the western border of Bihar, including Lakhisarai, Munger importantly.

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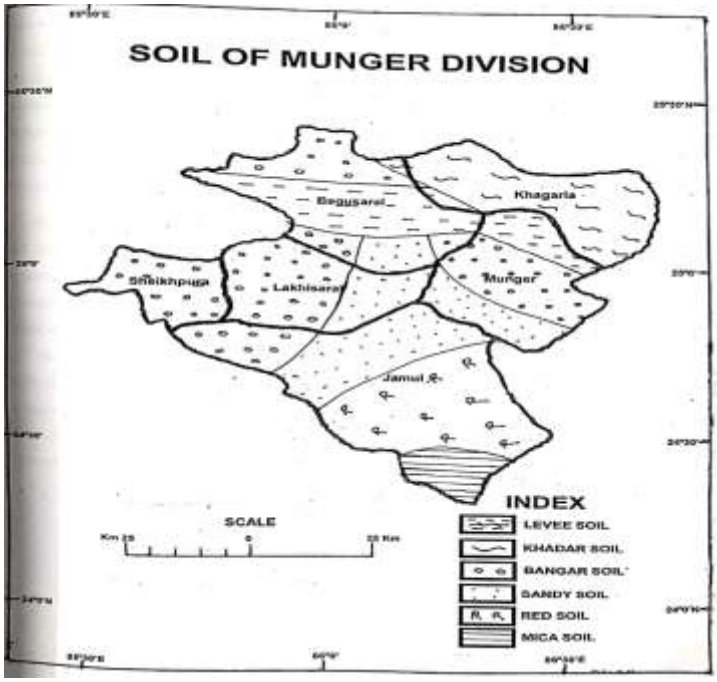
2. **Tal soil**: Areas along Ganga river has soils of entirely different nature. In this region frequent changes in the river course and formation of Diara land provide soils having higher sand content. There soils are recent alluvium with or without calcareous content.

3. **Residual soil**: Areas along the southern margin of the state Bihar consisting of a number of hills and hilly projection of the Chotanagpur plateau and Kaimur hill which have residual soils in this particular area.



This map shows the distribution of soil in the region.

Vegetation: The vegetation, an assembly of plants, trees and shrubs plays an important role in environmental role and climatic stability.
Its significance has tremendously increase due to unbalancing ecological condition caused by rapid industrialization and too much human interference in natural domain. The natural forest act states that atleast 33% of the total land of the region.
The following table shows the distribution of forest in the Munger Division.

FOREST LAND AREA IN MUNGER DIVISION

1. S.N.	2. Districts	3. Forest land in 000 hectares	4. Forest % of land of districts
5. 1	6. Munger	7. 28.52	8. 21.25
9. 2	10. Jamui	11. 92.86	12. 68.83
13. 3	14. Lakhisarai	15. 13.45	16. 9.92
17. 4	18. Total	19. 134.83	20. 100%

Source- Census data Bihar, 2011

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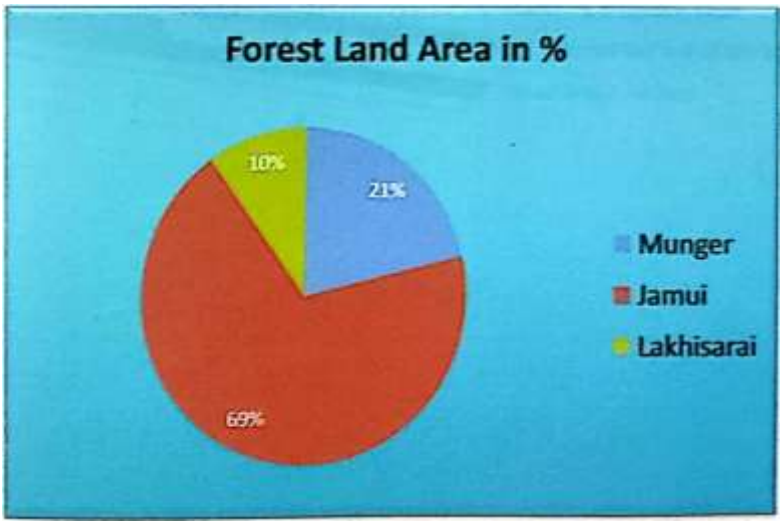

The above chart shows the composition of forest in Munger division.
The above table depicts that in Munger division, the highest forest cover district is Jamui following by Munger district and Lakhisarai district.

Forest are natural or man-made vegetation. Forests in Munger division are mainly natural vegetation and partly plant by man. The constitute man greatest as well as one of the mostly sadly misused. The total study area has not the same relief, soil and even moisture supply here there is conspicuous variation in the type of vegetation. The grasses generally growing like Dub, Kans, Mujpalmyra, Babool, Datepalm, Mahua, Tamarind, Neem and other trees.

Forest is an important natural resource of the region. It serves a variety of human purpose. It is a resource in true sense of the term for it satisfies human needs. Soil is the valuable timber tree and other timber trees are shisham, asan, gamhar, mahua, karan and bia. These are used in the construction of doors, windows of the tree, buildings. The importance of bamboo can hardly be exaggerated. It is used in paper industry and is a multipurpose tree.

Forest is a valuable renewable resource. It is valuable because it plays multiple roles in human life. Secondly it is resource for its fulfils human needs and it is functional. It performs functions for the satisfaction of human wants and needs. It is but relevant to analyse and examine the concept of resource in this context.

According to Zemmerman, "Features of environmental which are considered to be capable of serving man's needs they are given utility by the capabilities and wants of man."

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Advantages of Forest:

Forests are precious natural resource which not only play significant role in national and regional economy but help in pollution control and maintain ecological balance. Forests give many direct and indirect advantage. These are following:

Forests are the source of valuable timber for domestic and commercial use. Industries like paper, match making, lac, furniture etc. forest supply a good number of minor products like gum and resins, medicines, herbs, honey, spices etc. Grazing of cattle, employment for people in lumbering, sawing, furniture making, fruits gathering etc. habitat for primitive tribe, gives biological fertilizer, maintaining ecosystem etc.

There are great variety of trees in Munger Division. Some of the important trees include mango, sal, babool, neem, mahua, shisham, plums, amla, bamboos, pipal, banyan, siris, khair etc. There are several industries based on these trees in this region.

SAWING MILLS
There are thousands of saw mills located in the region. Most of them are located in Mungur, Jamui districts.

FURNITURE INDUSTRIES
Furniture industries is prevalent in the area. Most of the articles made at furniture industry include table, chair, beds, sofa, agricultural implements etc. Munger is the greatest hub furniture industry.

MATCH-BOX INDUSTRIES
There are many match box industries in this region.

PROBLEMS ASSOCIATED WITH DEFORESTATION:

Ever decreasing forest cover does not augur well for any region, state or the nation as a whole. It gives birth to a host of problems. There problems are physical problems and socio-economic problems. The farmer includes environmental degradation, disequilibrium in ecosystem, increasing uncertainty in weather and climate, decrease in herbivores animals thus threatening the very biodiversity and resulting into extinction of many useful animals and plant. The socio-economic problems resulting from loss of forest and green cover are even more serious.

FOREST CONSERVATION AND MANAGEMENT PROGRAMME

Keeping in view the high growth of population, deforestation due to forest clearing and in discriminate felling of trees, soil erosion, increasing population, the restoration of green cover came to minds of policy makers and planner in the latter half of the 20th century. The single moto was how to increase the forest cover and green cover.

Besides conservation of forest and wide management of forest, multi purpose, agricultural planning was launched for planting trees on farm land, vacant land with huge incentives. Afforestation on slopes of hills was launched. Strict rules were also enacted to protect the reserved forests. In the five year plans the concept of social forestry was executed for increasing the green covers.

In this regard many policies formed and in 1985 Govt. of India created new Ministry of environment, forest and wildlife and initiated solid programme by extending its instruction harmonize all these components.

CONCLUSION

In contemporary period resources are very important for development of any country or region. It may be in any form like soil resources, water resources, vegetation or forest resources, minerals or human resources. The study is an attempts to find out the genuine condition of forest resource in Munger Division of Bihar and to develop an integrated strategy for the balanced development of the region.

Forest is the greatest renewable natural resource and one of the most striking features of the landscape. The importance of the use of the forest resource and its conservation has been admitted all through the ages and men have made extensive use of it for their comfort and luxury. It has shaped the economy of the division of Munger and increase human consumption by providing raw materials which are needed most for our industries.

No one can deny the importance of forest in the regional ecology as well as in the economy. A vast wealth is hidden in the thick forest because it provides men with essential commodities like fuel, medicinal herb, fodder materials, timber and different types of fruits. Forest plays a vital role in arresting the monsoon rains etc.Forest is the primary source of our livelihood. So it should be developed such a manner that it serves for the next generation too.

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