ISSN: 2278-4632
Vol-10 Issue-7 No. 14 July 2020

Distribution of Forest Resources in Ahemdnagar District, Maharashtra, India.

Bramhanand Jalindar Darade

Assistant Professor of Geography, Babuji Avhad Mahavidyalaya, Pathardi, Dist Ahmednagar, 414102 (Maharashtra) and Research scholar (Ph.D) Savitrabai Saviribai Phule Pune University, Pune (Research Centre- Ahmednagar College, Ahmednagar).

ABSTRACT:

Present paper is based on secondary data of Ahemdnagar District. The District Geographical Area is 17048 (Sq.km) and forest area of the Ahemdnagar District is 1994 square kilometers which is 11.70 percentages of the total geographical area of the Ahemdnagar District. Natural resources area the bases of prosperity of any stats under which the land, water, forest are includes. The relief availability of water, soil, and climate are importance factors for development of natural vegetation. The maximum vegetation covered in Akole tehsil out of other tehsil in Ahemdnagar District. Protected Area are Kalsubai, Harishchandra Garh Wildlife Sanctuary (WLS), Rehekuri WLS and Maldhok WLS (Part)

KEY WORDS: Resources, Vegetation, Forest, Ahemdnagar, Natural and Human Resources, GIS

INTRODUCTION:

(Prithwish Roy2007) According to Zimmermann's The word resources does not refer to a thing or a substance but a function which a thing or a substance may perform or to operation in which it may take part namely the function or operation of attaining a given end such as satisfying a want. Other words the word resources is an abstraction reflecting human appraisal and relating to a function or operation. (Prithwish Roy2007) Forest are close association of plants. According to Allen and Sharp 'It is a community of trees and associated organisms covering a considerable area, utilizing air, water and minerals to attain maturity and to produce itself and capable of furnishing man and land with indispensable products and services. (Shejul Meena Eknath 2020; Shejul Meena Eknath et.al, 2020) Resources is two types first is natural resources and second human resources. Resources measuring is not easy task. Resources is two types natural and

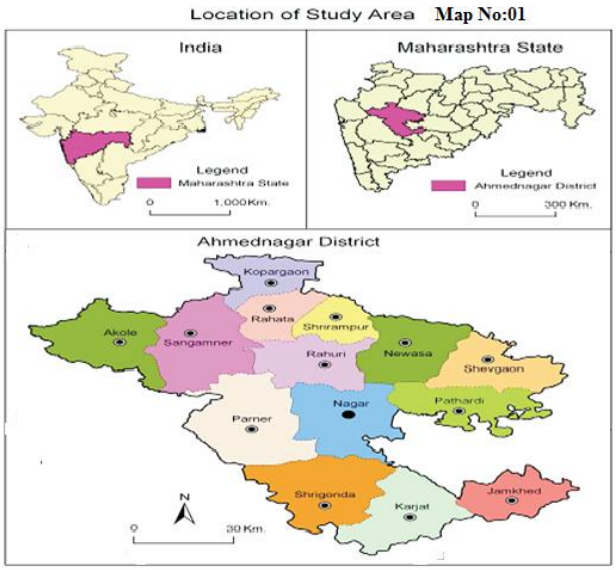
ISSN: 2278-4632
Vol-10 Issue-7 No. 14 July 2020

human resources. (Gadekar Deepak J 2015; Gadekar Deepak J 2016; Gadekar Deepak Janardhan 2018) Uma Gple et.al, (2018) forest are close formation of tree growing together at one place and one of the largest renewable natural resources. (Gadekar Deepak Janardhan 2016; S.D Gulave 2020) forest is natural resources, the vegetation delineation using a Landsat-7 & 8 (OLI) ETM+ Data for resourceful vegetation mapping. A forest is a complex ecosystems which is mostly composed of tress trees and is frequently a closed covering. (Bisen D.K et al., 2013; Gadekar Deepak J 2018; Anil A Landge et.,al. 2020)Water is importance key of other natural resources. (Gadekar Deepak J 2019) the resources are unequal distribution because of affecting factors effected on resources e.g topography, climate, soil, water bodies. The forest distributions depend on the physical, geographical, climatic and ecological factors there are different types of forest e.g. evergreen forest and deciduous forest. (Sonawane Vijay R. et.,al. 2020; Sonawane Vijay R. et, al.2020) soil as a resources and natural resources area the bases of prosperity of any stats under which the land, water, forest are includes.

STUDY AREA:

The present study Ahmednagar district has been selected as a study area. It extends between 18° 20´ and 19° 59´ north latitudes and 73° 40´ to 75° 43´ east longitudes (Map.1) located in part in the upper Godavari basin. The district is very dense in shape and length of 200 km. a width of 210 km. This study region is divided into there are three physical divisions namely, first Sahyadri moutons ranges i.e. Kalsubai, Adula, Baleshwar and Harishchandragad, second Plateau third plains area. The Godavari, Bhima River is the main rivers in this district with the major tributaries are Paravara, Mula, Sina, Dhora, Kukdi ect. And the recharge (water available) of rivers is mainly depending on rainfall in western ghat. Ahmednagar district occupies 17,048 square km geographical area. The administratively there are divided into 14 tahsils. The average annual rainfalls is 578.8 mm. (22.79") and mean daily maximum temperatures is 39°C and mean daily minimum temperature is 11.7° C. In study region 71.10 percent area under cultivation area out of them 32.40 percent is irrigated and 67.60 percent rain fed or rain shadow area. According to 2011 census population is 45, 43,083 in which male and female are 2,348,802 and 2,194,281 correspondingly. The density of population was 266 persons per square kilometers.

ISSN: 2278-4632
Vol-10 Issue-7 No. 14 July 2020



OBJECTIVE: The objective of this study is to demarcate the forest area and to analyses the classification of forest on the base of different types of vegetation.

DATABASE AND METHODOLOGY:

The analysis based on secondary data collected from Ahmednagar district statistical website. The obtained data for forest has been converted in percentage values for better understanding and categorized into three zones are high, moderate and low. The used cartographic methods e.g bar graph etc. The data analyzed and presented in the form of table and maps with analysis is done with the help of SPSS software and for mapping purposes used Arc GIS10.3 version GIS software. The data is represented with the help of suitable classification groped of the forest area in first high forest area under grouped in more than 22 percentage covering forest area used this criteria second grouped less than 22-10 percentage is moderated forest area and low forest area having less than 10 percentage forest area in total geographical area. The forest area prepared in 2016 years this data collected Directorate of Economics and Statistics Ahmednagar district Planning Department, Government of Maharashtra, India.

RESULT AND DISCUSSION:

(Kudnar, N.S., 2016; Kudnar 2017) topography result in rainfall, and impact of rainfall on distribution of vegetation. Bisen, D.K. and Kudnar N.S. (2019) Climate is importance factors for influencing on resources. So the topography and rain fall in ahmednagar district are observed to have affected the distribution of vegetation. In which the maximum forest covering in found in

ISSN: 2278-4632
Vol-10 Issue-7 No. 14 July 2020

the Akole Tehsil (27.2 percent) and second Rahuri (15.4 percent) with third number Parner (10.1 percent). The maximum vegetation covered in Akole tehsil out of other tehsil in Ahemdnagar District. Protected Area are Kalsubai, Harishchandra Garh Wildlife Sanctuary (WLS). Then Parner (10.1perctage), Shrigonda (9.5 perctage), Karjat (8.8 perctage) in these tehsil moderate and low forest but importance Rehekuri WLS and Maldhok WLS (Part) it is found this area.

Table no 01: Forest area in Hectares and percentage (2016 year)

Name of Tehsils	Total Geographical area in Hectares	Forest area in Hectares	Forest area in percentages
Akole	150400	41698	27.7
Jamkhed	87524	3772	4.3
Karjat	149152	13068	8.8
Kopargaon	70613	0	0.0
Nagar	150272	13165	8.8
Nevasa	129204	1459	1.1
Parner	186792	18792	10.1
Pathardi	117784	6426	5.5
Rahata	68786	0	0.0
Rahuri	101685	15706	15.4
Sangamner	135780	1140	0.8
Shevgaon	108713	1157	1.1
Shrigonda	160481	15210	9.5
Shrirampur	50602	0	0.0
Total	1667788	131593	7.9

Sources: Directorate of Economics and Statistics Ahmednagar district

Table no 02: Level of Forest Area

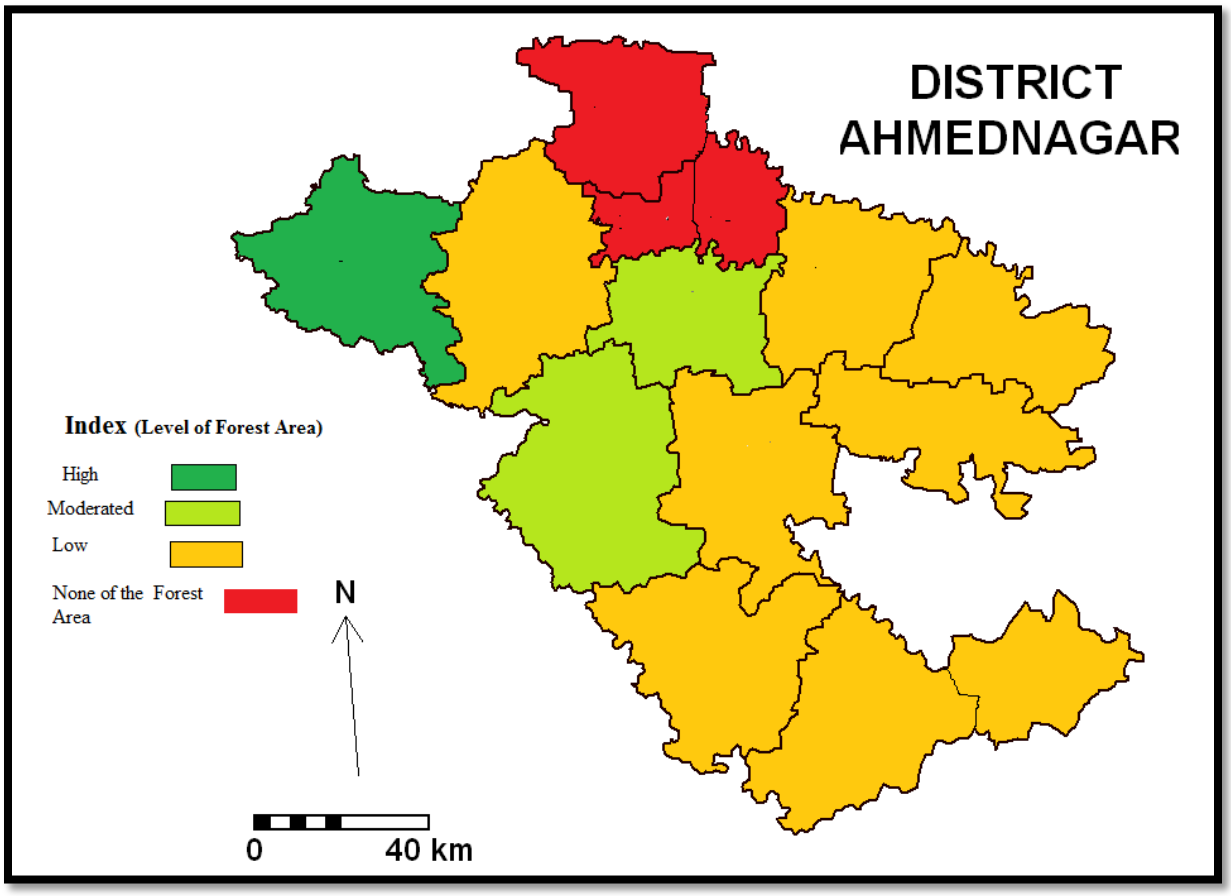
Sr.no	Index value in %	Level of Forest Area	Name of the Tehsils	Number of Tehsils
01	More than 22	High	Akole	01
02	22.1 to 10	Moderated	Parner, Rahuri	02
03	Less than 10	Low	Jamkhed, Karjat, Nagar, Nevasa, Pathardi, Sangamner, Shevgaon ,Shrigonda	08
04	0	None of the Forest Area	Kopargaon, Rahata, Shrirampur	03

ISSN: 2278-4632
Vol-10 Issue-7 No. 14 July 2020

Sources: computed by Authors

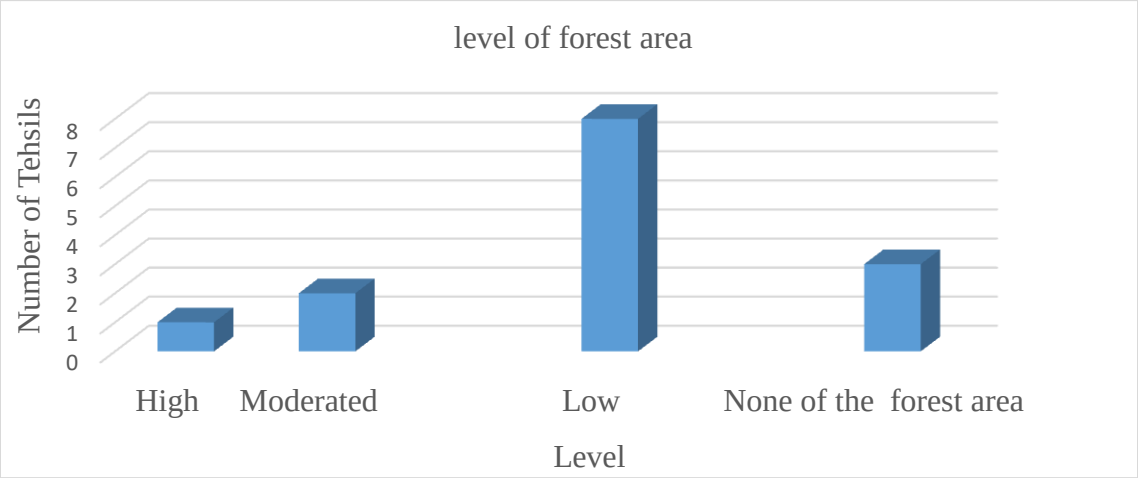
The geographically, there are two types of tropical forest found in the district. In tropical monsoon region where rainfall is seasonal and a definite dry season exists this deciduous and semi evergreen forest are prevalent. It's also known as monsoon forest and same part covering grassland. These forest are used to protect the trees wood, land and soil conservation to maintain climatic condition. The zone of high level of forest distribution comprises of one tehsil having more than 22 percent forest cove area those area is Akole tehsil. This area maximum forest area because of average rainfall is 1058 mm and Kalsubai is a mountain in the Western Ghats, located in the Indian state of Maharashtra. Its summit situated at an elevation of 1646 meters is the highest point in Maharashtra. The mountain range lies within the Kalsubai Harishchandragad Wildlife Sanctuary.

Map no 02: Distribution Pattern of Forest Resources in Ahemdnagar District



ISSN: 2278-4632
Vol-10 Issue-7 No. 14 July 2020

Graph no 01: level of Level of Forest area with number of Tehsils



The zone of moderate level of forest distribution comprises of two tehsil namely Parner (10.1 percent), Rahuri (15.4 percent) and third zone is low (less than 10 percentage) of forest distribution tehsil is Jamkhed (4.3), Karjat (8.8), Nagar (8.8), Nevasa (1.1), Pathardi (5.5), Sangamner (0.8), Shevgaon (1.1),Shrigonda (9.5) . The low forest area covering in these tehsil Jamkhed, Karjat , Pathardi, Shevgaon ,Shrigonda because of drought prone area and effect of rainfall in this tehsil. Sangamner and Nagar tehsil low forest area because of two area goring urban area and Nagar is district place. The zone of none of the forest area tehsil are Kopargaon, Rahata, and Srirampur.

CONCLUSION:

Ahemdnagar District has 14 tehsil in total out of which is Kopargaon, Rahata, Shrirampur tehsil have zero forest coverage. The highest forest cover in Akole tehsil (27.7 percentages) thus Protected Area are Kalsubai, Harishchandra Garh Wildlife Sanctuary (WLS) and very good environment condition and minted air quality level. The low forest area covering in these tehsil are Jamkhed, Karjat, Pathardi, Shevgaon, Shrigonda because of drought prone area. It is topography and Climate (Rainfall) factors large affected on distribution of vegetation of any area. Rehekuri Wildlife Sanctuary and Maldhok WLS (Part) founded same part in Jamkhed , Karjat, Shevgaon ,Shrigonda etc. The large part of forest area has been depleted and degraded

ISSN: 2278-4632
Vol-10 Issue-7 No. 14 July 2020

which is a serious concern regarding which very person should plant minimum five tree for forest conservation

REFERENCE:

1. Anil A Landge et.,al. (2020)Temporal Variation of Rainfall in Ahmednagar District of Maharashtra, India. Our Heritage,68(30) 12850-12863
2. Bisen D.K and Kudnar N.S. (2013) A Sustainable Use and Management of Water Resource of the Wainganga River Basin: - A Traditional Management Systems. figshare. Journal contribution. https://doi.org/10.6084/m9.figshare.663573.v1
3. Bisen, D.K. and Kudnar N.S. (2019) Climatology, Sai Jyoti Publication, Nagpur, Pp- 1-244.
4. Bisen et.al (2010) A Geographical Analysis of Population Density Pattern in Bhandara District, The Goa Geographer, 2(1) 130-132.
5. Gadekar Deepak J (2015) Level of Human Resources Development- Concepts and Review, Acme international Journal of Multidisciplinary Research, 3(6) 48-61.
6. Gadekar Deepak J (2017) Regional Disparities of Socio- Economic Development in Ahmednagar District, Maharashtra (India) , International Journal of Recent Research and Applied Studies 4 (5), 30-36
7. Gadekar Deepak J (2018)Level of Human Resources Development in the Akole Tahsil District- Ahmednagra Maharashtra unpublished Ph.D Thesis Savitribai Phule Pune University
8. Gadekar Deepak J (2019) Regional Disparities of Woman Resources in the AkoleTahsil District Ahemdnagr Maharashtra State, India. Online International Interdisciplinary Research Journal, 9(2), 94-99.
9. Gadekar Deepak Janardhan (2016) A Hybrid Land Cover Classification of Landsat-7 & 8 (OLI) ETM+ Data for Resourceful Vegetation Mapping - Akole Thasil Dist-Ahmednagar, M.S, India, American International Journal of Research in Humanities Arts and Social Sciences,13(3) 217-221.

10. Gadekar Deepak Janardhan (2016) A Temporal Study of Human Resources Development in the Akole Tahasil, International Journal of Research, 3(5) 273-280.

11. Gadekar Deepak Janardhan (2016) Regional Disparities of Agricultural Development in Ahmednagar District, MS, India, International Journal of Research in Social Sciences, 6(8), 389-403.
12. Gadekar Deepak Janardhan and Mhaske P. H (2018) A Study of Rainfall Characteristics in Ahnednagar District (Ms), Shodhankan International Journal, 1 (15) 35-39.f
13. http://mahaforest.gov.in/district_detail.php?lang_eng_mar=Eng&dist_id=45
14. Kudnar, N.S., (2016) Topographic Characteristics of the Wainganga River Basins Using GIS & Remote Sensing Techniques , Multidisciplinary Research Journal, Indian Streams Research Journal, pp-11-22.
15. Kudnar, N. S., (2017) Morphometric Analysis of the Wainganga River Basin Using Traditional & GIS Technique, Ph.D. Thesis, Rashtrasant Tukadoji Maharaj Nagpur University, Nagpur, Pp 66-250.
16. Prithwish Roy (2007) Economic geography, a study of resources, New central Book Agency (P) Ltd. Kolkata, 13,14,57, 119-122.
17. Ranjana S. Ingale and Sachin Deore (2015) Patterns of Forest Utilisation by inhabitant of forest in Pune district, Maharashtra, India," Trans. Inst. Indian Geographers, Vol. 37, No. 1, 59-66.
18. S.D Gulave (2020) Use of Landsat ETM+ Data for Delineation of Vegetation Cover Area in Akole Thasil, , International Research Journal of Engineering and Technology, Volume 7, (2)57-61.
19. Shejul Meena Eknath (2020) Level of Human Resources Development - A Conceptual and Review Exposition, International Journal for Research in Applied Science & Engineering Technology, 8 (03) , 687-691. doi.org/10.22214/ijraset.2020.3130
20. Shejul Meena Eknath et.al, (2020) A Geographical Study of Human Resources Development in Ahmednagar District, Maharashtra, India. EPRA International Journal of Multidisciplinary Research 6 (03) 86-93. https://doi.org/10.36713/epra4116
21. Sonawane Vijay R. et.,al. (2020) Analysis of Chemical Properties of Soil under Sugarcane Crop: A Case Study of Khandala, Shrirampur, Ahmednagar District, Maharashtra State, India. Our Heritage 68(30), 6522-6547.

22. Sonawane Vijay R. et.,al.(2020) A Geographical Study of Crop Combination in Tribal Area of Nashik District, Maharashtra, India**.** *Studies in Indian Place Names, 40(3)3915-3940.*
23. Uma Gple et.al, (2018) Distribution pattern of Forest resources in Chhattisgarh, The Deccan Geographer, 56 (1and 2) 117-131.

