

# Land Use Pattern in Byadgi Taluk of Haveri Distirct Karnataka – A Geographical Analysis

**KEYWORDS** 

Taluk, land, net sown area, forest, fallow

# Sri G.N.Kummur

Assistant Professor, Dept. of Geography, Karnataka Science College Dharwad -580001 Karnataka State

ABSTRACT The Byadagi taluk covers an Geographical area of 43,656 hectares. There are 63 villages with total population of 1,27,944 (2001). The taluk has 63 villages spread over two revenue circles viz., Byadgi and Kagenelli.

During 2009-2010 the forest land has been continued as per the previous period 1999-2000 i.e.,4889 hectares 11.20 percentage. The fallow land which was 83 hectares has been increased to 6,065 hectares 9.43 percent. Land not available for cultivation was 2540 hectares 5.81 percentage which shows rather constant. The cultivable waste has remained as slit changed 1583 hectares 3.64 percentage to 1588 hectares 3.84 percentage. Net sown area was reduced 28,583 hectares was reduced -11.74 percentage.

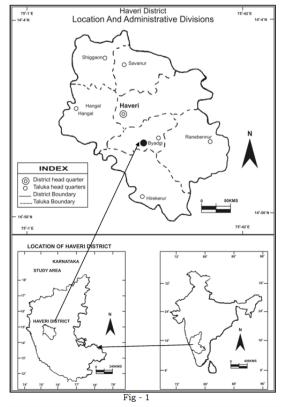
#### Introduction

Land is one of the most precious natural resources which plays a decisive role in determining socio-economic and cultural progress of man, it is evident from the socio-economic history of different nations of the worlds.

#### Study Area

Byadgi taluk is located between 14°-15¢ and 14°-46¢ north latitudes and 75°-15¢ to 75°-35¢ east longitudes and situated in the central portion of south western part of Haveri district. Byadgi is at a distance of 323 kms. from Bangalore and about 18 kms. from Haveri city by road. The taluk is bound by the Haveri taluk to the north, Hangal to the west, Hirekerur to the south and Ranibennur taluk to the east. The Byadgi taluk covers an area of 43,656 hectares. There are 63 villages with total population of 1,27,944 (2001). (Fig.1)

### LOCATION MAP OF BYADGI TALUK



# **Objectives**

# The main objectives of the present study are:

- To critically analyse the general land use pattern of Byadgi taluk for the period of 1989-90, 1999-2000 and 2009-10.
- To examine the natural factors.
- To identify various types of land use.
- 4) To examine the change of land use.

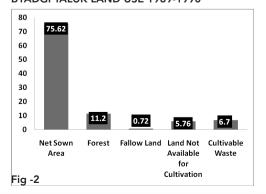
#### Methodology

The present investigation is based on both primary and secondary information. Secondary data is collected from district at a glance. Land use data gathered by thasildar and agriculture office of Byadgi taluk. By using LQI (Location Quotient Index) and change of percentage method. The 1989-90, 1999-2000 & 2009-2010 data is used for land use and 2001 census.

Land use Pattern in Byadgi Taluk

SI.No.	Land Use	1989-90 (in hectares)	Percent to the Total area	1999- 2000 (in hectares)	Percent to the Total area	2009-10 (in hectares)	Percent to the Total area
1	Net Sown Area 33013		75.62	34584	79.21	30521	69.91
2	Forest 4889		11.20	4889	11.20	4889	11.20
3	Fallow Land 316		0.72	83	0.20	4118	9.43
4	Land Not Available for Cultivation		5.76	2517	2517 5.76		5.82
5	Cultivable 2921		6.70	1583	3.63	1588	3.64
	Total	43656	100.00	43656	100.00	43656	100.00

# **BYADGI TALUK LAND USE 1989-1990**



#### **BYADGI TALUK LAND USE 1999-2000**

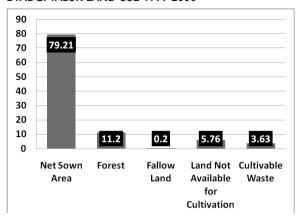


Fig -3
BYADGI TALUK LAND USE 2009-2010

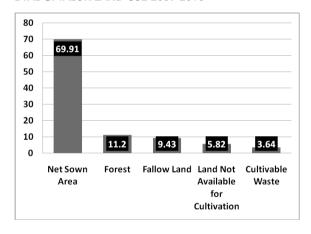


Fig-4

# Land Use Pattern Net Sown Area:

Out of the total geographical area of the taluk 33,013 hectares 75.62 percentage was as a net sown area in the year 1989-90, whereas it increased to 34,584 hectares was 79.21 percentage in the year 1999-2000. Table -1 During 2009-

Table -2 Change of land use in percentage

2010 it came down to 30521 hects was 69.91 percentage fig-2to4

# Forest:

The area under forest has not been changed since 1989-90 to 2009-10. Thus it is spread in 4,889 hectares 11.20 perentage. Though taluk has got meager area of forest when compared to the district 9.93 percentage, which is a little high but quite low when compared to the state 15.85 percentage. It is needless to say that in order to maintain a balanced environment and ecology of the region some more percentage of land should be brought under forest, especially by converting the waste land. Social forestry if expanded can be of great benefit to Byadgi taluk.

#### Fallow Land:

Byadgi taluk had a fallow land of 316 hectares 0.72 percentage to the total geographical area in the year 1989-1990, whereas it was about 83 hectares 0.20 percentage in the year 1999-2000 . Therefore, there is a net decrease of 233 hectares. During 2009-2010 the fallow land increase to 4118 hectares, Due to dryness the falls fallow as there is inadequate supply of moisture to germinate and to grow crop, whereas in the wet tract the irrigation used erroneously by the poor illiterate farmers leads to seepage of water resulting in alkalinity and salinity conditions of soil, discouraging cultivation. During 2009-2010 the fallow land increase to 4118 hectares 9.43 percentage. Therefore there is net increase of 4035 hectares.

### Land not Available for cultivation:

The land under this category comprises those lands which are put to non-agricultural uses such as settlement, burial grounds, play-grounds, railways, roads, embankments, etc. during 1989-90 the taluk had 2,517 hectares was 5.76 percentage to the total geographical area of land as not available for cultivation while it has not changed in the year 1999-2000. During 2009-10 it was 2540 hectares. The need at land for socio-cultural developmental activities in the taluk has made to increase its share under "not available for cultivation".

### **Cultivable Waste:**

This category of land includes permanent pastures, grazing lands and micscellaneous trees. The taluka had on area of 2,921 hectares as cultivable waste 6.70 percentage to the total geographical area in the year 1989-90 whereas in the year 1999-2000 it was 1,583 hectares was 3.63 percentage. Therefore there is net increase of 1,588 hectares was 3.64 percentage.

	gg-											
SI. No	Land use	1989-90 (in hec- tares)	Percent to the Total area	1999- 2000 (in hectares)	Percent to the Total area	1989-90 to 1999-2000 Change of %	2009-10 (in hec- tares)	Percent to the Total area	1999 -2000 to 2009 – 2010 Change of %			
1	Net sown area	33013	75.62	34584	79.21	+4.74	30521	69.91	-11.74			
2	Forest	4889	11.20	4889	11.20	0.00	4889	11.20	0.00			
3	Fallow Land	316	0.72	83	0.20	-72.32	4118	9.43	+4615.00			
4	Land not available for cultivable waste	2517	5.76	2517	5.76	0.00	2540	5.82	+1.04			
5	Cultivable waste	2921	6.70	1583	3.63	-45.82	1588	3.64	+0.27			

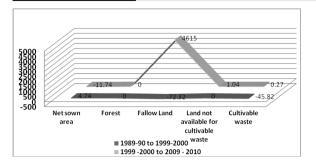


Fig : 5

# Land use Changes:

Based on the village wise survey conducted in 2009-10 by the revenue department of Byadgi taluk, the total geographical are of the Byadgi taluk is 43,650 hectares (Table-2). It was not change from 1989-90 to 2009-2010 69.91 percent. The net sown are of the taluk in 2009-2010. The lower per centage of land sown in the taluk is mainly because of first cover in eastern part of while underlating topography in the souther part. However, due to social and technological change in the talu, the percentage of net sown area has been increased +4.79 percentage by 1999-2000. The net sow area has been 2009-10 decrease -11.74 percentage its cause the follow land. (Fig. 5)

The second largest use of land in Byadgi taluk is forest 11.20 percentage. A large part of the eastern and southern hilly resion in the taluk is of reserve forest and as such there has not been much reduction in the forest area.

The analysis of the data shows that initially the reduction in the follow land 1999-2000, -72.22 percentage was the main source of the increase in the net sown area, since 2009-10 increase of fallow land + 4615 percentage main causes geographical conditions reduce the net sown areas.

Since 1989-90 to 1999-2000 the percentage of land under non agricultural uses has been not change 2009 – 2010 increase of +1.04 percentage. The non agricultural use of land mostly includes the land under settlement, roads and railways. The increase in this category is mainly due to the expansion of sttlement areas apart from the settlements the largest expansion is of Byadgi urban area.

The uncultivable waste in 1999-2000 was -45.82 due to the increase at net sown area 2009-10 was increase +0.27 percentage. Most of this area has rocky out crops and cannot be used for cultivation. This land could at the most be put under scrub cultivation while the stones could be used for road/buildingconstruction.

The analysis of the landuse pattern of the Byadgi taluks shows that the major utilization of the land is for agriculture. Due to variation in climate.

#### Conclusion:

Byadgi taluk located in the south western part of Haveri District is a drought-prone area. Consisting of 63 villages and 1,27,944 (2001) population, it is an under developed taluk with plain topography and a few isolated hills. The taluk receives about 849 mm. annual rainfall. The red, red loamy and black are important soil of the taluk. For administrative purpose the taluk is demarcated into two revenue circles namely Byadgi circle and Kaginelli circle, consisting of 26 nad 37 villages respectively. The taluk has 69.91 percent of land under agriculture (2009-10). The area is poorly irrigated (4,556 hectares) with 13.63 percent irrigated by tanks and wells. The study reveals that the area under irrigation can be increased, provided the small and medium farmers are given financial assistance to dig the wells. The irrigation tanks that are existing need dredging of sand silt, so as to increase storage capacity during rainy season.

The analysis of the landuse pattern of the Byadgi taluk shows that the major utilization of the land is for agriculture. Due to variation in climate, physiography and soils in the taluk a variety of crops are grown. Howver traditionally Jowar, Maize, Cotton and Chilly are grown in the taluk variety of other crops such as peas, bengal gram, green grans, vegetable, etc are also grown on very small scale in the taluk.

REFERENCE

Amani, K.Z. 1966: "Land utilization in Aligarh District" Geographia, Vol.5, pp. 27-35. | Amani, K.Z. 1968: "Land utilization in village Galgarhi" Geographia, vol. 15, pp. 57-73. | Arwnachalam, B 1959: "Landuse and classification and possibilities of replanning of landuse in vanamadevi village" Bombay Geog. Mag., Vol.6 and 7, September, No. 1, pp. 19-39. | Mandal, R.B. 1982: "Land utilization, Theory and Practive" concept publishing Co., New Delhi. | Prasada Raju, 1984: "Land forms and Landuse studies in | P.V.S.P Sachi Devi S, Nandyal Taluk, Kurnool District Andhra | and Babu, V.R.R.M. Pradesh", Annals of the National Association of Geography India, Vol. IV, No. 2 pp. 1-12. | Sharma, S.C. and: "Land capability classification and landuse | Rajni Sharma planning: Block Padrauna District Deoria (Uttar Pradesh) a case study, Geographical review of India, Vol. 62, pp. 31-40.