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#### A Current Status of Buffalo Distribution of Solapur District in

Maharashtra State.

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#### **Abstracts**

Livestock sector plays a prominent role in rural economy for supplementing the income of rural households particularly for landless laborer's, small and marginal farmers. The study was conducted to understand the growth and trends of livestock population of Solapur district a Current Status of Buffalo in Maharashtra. The secondary data pertained to livestock; Buffalo population was collected from various sources. The livestock population estimates of Solapur district show that the buffalo has shifted in favor population is in the process of erosion and being replaced. This is necessary for rise in milk production in the district. Further, there has been increased in livestock population in Solapur district in 2018 as against 1998. The estimates also show much moderate annual rate of growth in milk production in the district of Solapur.

Keywords: buffalo distribution, buffalo population, percentage growth rate

#### INTRODUCTION: -

The cornerstone of India's development is the White Revolution. White Revolution is the basis of the world's food. The health of the community of the nation is its property. The health of a community or people is based on food. Milk is the complete diet. Life is imperfect without milk. Milk is an opaque white fluid produced by the mammary glands of females. Cow's milk has fewer fat than buffalo's milk. That is why buffalo milk is thicker than cow's milk. Cow's milk contains 3-4 percent fat, while buffalo's milk contains 7-8 percent. Buffalo milk is heavy for the stomach, so it takes time to digest it and when you drink it, you do not feel hungry for a long time. Buffalo milk comprises 10-11 percent more protein than cow's milk. Young children and old people are not advised to drink buffalo milk due to high protein content.

The available information on physicals and economic characteristic of the breed is confined to the data of organized farms only. This is not based on scientific survey and did not cover the extent of variability presenting the animals of the breed. No information is available about their native environment and management to which this breed was subjected. This is, thus, a need to generate information on physical confirmation, body measurement and economic parameters related to growth, production, reproduction and endurance. In addition, the information about feed resources, prevalent management practices and system of handling etc. essential to be standard. Hence, the present investigation was undertaken to assess only the production and performance of buffaloes in its breeding/home tract.

There are more than 20 significant types of Buffaloes (Asian River type) in India, including 10 distinct varieties, in particular Murrah, Nili Ravi, Jaffarabadi, Surti, Bhadawari, Mehsana, Banni, Marathawadi, Nagpuri, Pandharpuri and Toda. These varieties have been gathered into 5 gatherings dependent on their unique environments. Significant Buffaloes breeds.<sup>1</sup>

In India, the ox-like populace hardly expanded by 1.8 %, from 299.6 million out of 2012 to 305 million in 2018.<sup>2</sup>

Buffaloes share 12% of the world's milk creation and India and Pakistan together produce 90% of the world's wild ox milk. Dairy Buffaloes industry is thriving in Italy because of notoriety of Buffaloes mozzarella cheese in Europe. In Brazil and Argentina, buffaloes are reared for milk and meat creation. High-yielding Murrah wild ox is just about as great as Holstein Friesian cow among buffaloes. Buffalo milk with 7 to 8 percent fat and 3.5 to 4.0 percent proteins, is more extravagant in quality than cow milk.<sup>3</sup>

The Pandharpuri Buffalo is a breed of bovines that evolved withinside the Indian kingdom of Maharashtra, and might effortlessly be diagnosed via way of means of their feature long, sword formed or twisted horns. These water buffalo are acknowledged for his or her excessive milk-yielding capacity, and adaptableness to the draught susceptible area, in which they may be normally distributed. They are very not unusual place withinside the rural milk generating farms in those areas.

#### Objective: -

- 1. To study of buffalo distribution and Change in the research area
- 2. To Analysis a current status of Buffalo distribution in research area

#### **MATERIALS AND METHODS: -**

The data pertaining to buffalo population over the years were collected from livestock census for past 20 years. The Department of Animal Husbandry, Ministry of Agriculture and Farmers Welfare, Government of India, India stat. com website, various publications of Department of Animal Husbandry Maharashtra state etc.

#### Analytical tools: -

The analytical tool used for assessing the objective of the study is,

$$\sqrt{\frac{\sum (x-\bar{x})^2}{(n-1)}}$$

Where x is the sample mean AVERAGE (Tahsil 1, Tahsil 2,...11) and n is the sample size.

#### Formula Description (Result)

=MIN (Tahsil 1, Tahsil 2,...11) Smallest of the numbers above (2)

Table 1.1
Change of Buffalo Distribution in Solapur District
(Change 1998 to 2018)

Sr. No.	Tahsil	Buffalo			Percent of Growth Rate		
110.		1998	2008	2018	1998-08	2008-18	1998-18
1	North Solapur	8982	8250	10109	9.18	12.25	17.77
2	South Solapur	13931	12787	16663	9.17	13.03	16.72
3	Mohol	14473	12285	21090	8.48	17.16	13.72
4	Barshi	23774	22383	19843	9,41	8.86	23.96
5	Madha	16395	11845	23275	7.22	19.64	14.08
6	Sangola	13831	12599	37725	9.10	29.94	7.33
7	Pandharpur	14812	16326	45277	11.02	27.73	6.54
8	Mangalwedha	9560	8800	20138	9.20	22.88	9.49
9	Malshiras	18042	14038	36616	7.78	26.08	9.85
10	Akkalkot	22504	20526	14897	9.12	7.25	30.21
11	Karmala	23194	18122	16882	7.81	9.31	27.47
	Total	179498	157961	262515	8.80	16.6	13.67
	S.D.		4527.26	11052.42	1.02	8.12	8.08
, ,	Mean		8250	10109	7.22	7.25	6.54

(Source-Livestock Census Report, 1999,2011, 2019, Compiled by researcher)

The high growth of buffalo in the study area is due to increasing demand of buffalo beef at local as well as universal equal. The unbearable increasing price of mutton and chicken for the lower- and middle-class families is one of the reasons leading to the purchase of buffalo beef which is easily available in the study area. Development of dairy at local and national level in the villages which is a new form of diversified form of agriculture in the study area also plays a catalytic factor in growth of buffalo rearing. Good proportion of Muslim population in urban centers has also encouraged demand for buffalo meat.

This improving index reflects the fact that the demand for livestock especially buffalo products is increasing up. Livestock number and human population in the area have shown uniformity with their mutual growth. Block wise analysis indicate as evident from table that five out of twelve blocks witnessed negative growth because of rather high growth of population and domination of high caste social groups who are not much interested in buffalo

rearing or dairy farming.

#### Distribution of Buffalo in Solapur District: -1998 to 2018

#### 1. High (Above 9.45percent): -

In the map shows, high distribution in Pandharpur tahsil as the significantly high increase in interest in buffalo keeping especially Milch buffalo are on account of the increasing intensity of irrigation resulting in shift of cropped are at of orders, the establishment of milk plants and chilling centers and the increasing facilities of road transport. (Map A)

#### 2. Medium (4.49 to 9.41percent): -

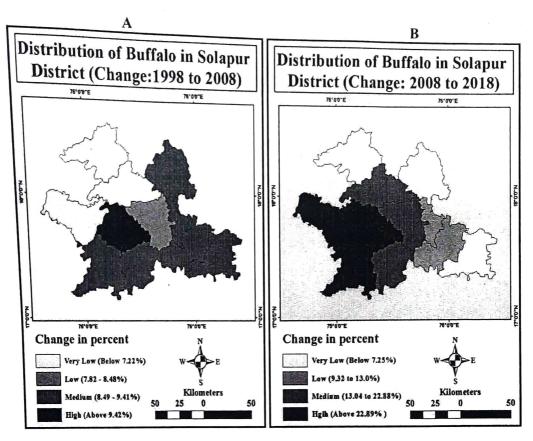
Map, B shows that, Barshi, Solapur North, South Solapur, Akkalkot, Sangola and Mangalwedha tahsil indicate medium change as, it is difficult for the landless class or the poor farmers to keep she buffaloes due to their large requirements of fodder and concentrates for good milk yield. As a result, the average yield is generally very low.

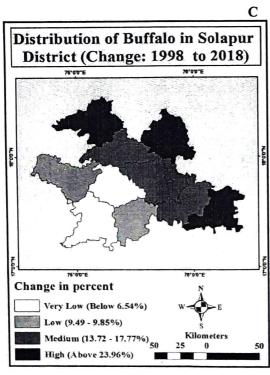
#### 3. Low (7.82 to 4.48percent): -

Map shows that the number of buffaloes low change in 1998 to 2008 as ,the growth rate of working animals has decreased, Since the use of working animals in agricultural operations is becoming less due to the increasing mechanization of agriculture particularly in the field of transportation, lifting water, ploughing and to a lesser extent in cultivation.

#### 4. Very Low (Below 7.22percent):-

The low increase in buffalo keeping may be due to low irrigational facilities, increasing importance of cow as Milch animal and shortage of green fodder. Decline in interest in buffalo rising is observable in Karmala, Madha and Malshiras tahsil.





The maps show that, changes in buffalo distribution from 1998 to 2018. The map shows the distribution changes in buffalo distribution in Karmala, Barshi and Akkalkot taluka in large numbers. Grass land, the economic condition of the farmers reflects the changes in this taluka due to government policy, changes in the dairy business etc. In the map, Madha and Mohol taluks is shown in North Solapur, South Solapur taluka in medium distribution of buffalo, this is because the dairy business in this area has not found a conducive environment, Also, small scale dairy business in Mangalwedha and Malshiras talukas developed last decade.

#### Conclusion: -

The present study concludes that, the role of buffalo in the rural economy of Solapur district is vital. High to medium for buffalo distribution in some talukas like Pandharpur, Malshiras, Sangola, Mohol and Madha indicate the resilience and the much-needed competitive strength in the wake of localization policy. In view of the fact that the livelihoods of millions are intertwined with livestock like buffaloes, the same need to be preserved and encouraged in the right path for which incessant research need to be complete. It is well understood that the future of Solapur district agriculture depends on animal husbandry sector and the growth of animal husbandry depends on three factors, it is depending research, agricultural policy and the farming community's cooperative action. The greater the synergy among these three factors, the better it would be for research area.

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