

## The demographic scenario of West Bengal: A review

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### Abstract

The study aims to analyze the demographic characteristics of West Bengal in a very brief pattern. The paper is provided with an idea of the quantitative as well as qualitative aspects of the population character in different districts of the state.

**Material and Methods:** The present study focuses on the Population growth, Literacy, Sex Ratio and tribal population situation in this state, which is entirely based on secondary sources of data, collected from the census (2011). The paper is an effort to provide a snapshot of emerging trends of demographic structure in West Bengal.

**Discussion:** The existing data shows that West Bengal stands slightly above and better in terms of a few national demographic achievements, whereas it stands below in some other aspects. Further, the present demographic status indicates that it is still a long way to achieve some goals.

**Conclusion:** In some demographic scenario West Bengal reflects excellent performance than the national level. For the achievement of the goals, there is a need to improve the existing health infrastructure as well as the socio-economic structure of the state.

**Keywords:** Population growth, literacy, sex ratio, tribal population, West Bengal

### Introduction

The word "Demography" came from the ancient Greek word "dēmos" which means "the people". The term "graphy" comes from "graphō", implies for "writing, description or measurement" <sup>[1]</sup>. Demography is popularly known as the science of populations study. Demographers understand population dynamics by investigating three main demographic processes, i.e. Birth rate, migration, and death rate, respectively <sup>[2]</sup>. These three elements enclosed within a specific region with a particular time-bound and continuously contributed to changes in populations' pattern. The study of demography is of immense importance to an economy for a country. Population studies help to know how far the growth rate of the economy is keeping pace with the growth rate of population from the micro to mesoscale. If the population is increasing at a faster rate, the speed of development of the economy will be slow accordingly. Governments use demography for political observations, scientists use demography for research purposes, and businesses use demography for advertising.

### Demographic scenario

West Bengal secured its position in 4<sup>th</sup> among the nation on the basis of 2011 census of India <sup>[3]</sup>. Due to its various social, cultural, economic and political reasons, the population of West Bengal has been increasing significantly over the last decade. The total population in this state is 91,276,115, out of which male is 46,809,027 and female population is 44,467,088. As the census data suggested that the entire population growth this decade (2011) is 13.84 per cent while in 2001, it was 17.84 per cent which indicates a slight decline of the population growth <sup>[4]</sup>.

### Density of population

Population density is unevenly distributed in West Bengal due to its physical as well as economic differentiation. Single largest concentration of population developed in the plain of Bhagirathi- Hooghly river basin area. The total area of West Bengal is 88,752 sq. Km. Based on this area density of population is 1,028 per sq km. This density is higher than national average 382 per sq km (2011) <sup>[5]</sup>.

**Table 1:** The district-wise density of population, West Bengal (According to Census: 2011)

Districts	The area in Sq. Km	Total Population	The density of population per sq. Km
Bankura	6882	3596292	523
Bardhaman	7024	7723663	1100
Birbhum	4545	3502387	771
Darjiling	3149	1842034	585
Haora	1467	4841638	3300
Hugli	3149	2701289	1753
Jalpaiguri	6227	3869675	621
Koch Bihar	3387	2822780	833
Kolkata	185	4486679	24252
Malda	3733	3997970	1071
Purba Medinipur	4736	5094238	1076
Paschim Medinipur	9345	5943300	636
Murshidabad	5324	7102430	1334

Nadia	3927	5168488	1316
North 24 Parganas	4094	10082852	2463
Puruliya	6259	2927965	468
South 24 Parganas	9960	8153176	819
Dakshin Dinajpur	2219	1670931	753
Uttar Dinajpur	3140	3000849	956
West Bengal	88752	91347736	1029

Source: (4)

**Sex Ratio**

A useful way to graphically represent the nature of age and sex composition of a particular population is to describe the data with the help of the population pyramid. The demographic characteristics of the region determine the shape of such pyramids. Socio-economic investigates also help for the changing pattern of the shape of this population pyramids over the census years [6].

**Table 2:** The population of West Bengal, (According to Census: 2011)

Districts	Male Population	Female Population	Total Population
Bankura	1840504	1755788	3596292
Bardhaman	3975356	3748307	7723663
Birbhum	1791017	1711370	3502387
Darjiling	934796	907238	1842034
Haora	2502453	2339185	4841638
Hugli	2819100	2701289	2701289
Jalpaiguri	1980068	1889607	3869675
Koch Bihar	1453590	1369190	2822780
Kolkata	2362662	2124017	4486679
Malda	2061593	1936377	3997970
Purba Medinipur	2631094	2463144	5094238
Paschimmedinipur	3032630	2910670	5943300
Murshidabad	3629595	3472835	7102430
Nadia	2655056	2513432	5168488
North 24 Parganas	5172138	4910714	10082852
Puruliya	1497656	1430309	2927965
South 24 Parganas	4182758	3970418	8153176
Dakshin Dinajpur	855104	815827	1670931
Uttar Dinajpur	1550219	1450630	3000849
West Bengal	46927389	44420347	91347736

Source: (4)

According to the census data presented above from 2001 to 2011, gives a clear picture regarding the district wise sex ration distribution over decay and this data indicates a sharp inclination of sex ratio over ten years.

**Mortality rate**

The mortality rate is measured by the number of deaths in a particular population per unit within a specific time boundary. The mortality rate is deaths per 1,000 individuals per year [7]. According to the parameters given by "World Health Organisation", there are specific causes for death in the developing counties like Lower Respiratory Infections, Heart Disease, Diarrhoea, Childhood Diseases, Malaria, Tuberculosis, Chronic Obstructive Pulmonary Disease, HIV-AIDS etc. [8].

**Migration Pattern**

Migration defines as the mobility of people from one place to another; it may be a permanent or temporary as well as a short or long term. It is also found that employment is the leading cause of men's movement and marriage remains the

most dominant for female migration. The migration pattern is focused on the spatial patterns, the tempo of urbanization [9]. The proportion of migrants has increased from 27% in 1991 to 30% in 2011 in this state. In the case of interstate migrants, West Bengal has more in-migrants than out-migrants. Bihar continues to be the initial state of origin of immigrants in West Bengal with 62.43% in 1991 and 63.68% in 2011. The level of urbanization increased from 27.81% in the 2001 Census to 31.16% in 2011, due to rural to urban migration. The speed of urbanization is not uniform over the years in this state. Mostly it is concentrated within some pocket on the basic of facilities and accessibilities of urban commodities [10].

**Literacy Rate**

The definition regarding literacy rate given by UNESCO is the total number to literate person expressed in percentage within a specific region and with a particular time-bound [11]. Literacy graph of West Bengal has seen as an upward trend and is 76.26 per cent as per 2011 population census. In this state, Male literacy stands at 81.69 per cent while female literacy is at 66.57 per cent, which shows a gender disparity in the socio-economical scenario. In 2001, the literacy rate in West Bengal stood at 68.64 per cent. Where male literacy was 77.02 per cent, and female literacy was and 59.61 per cent, which was also represented gender discrimination in the state [12].

**Religion & Language**

Religion diversity is one of the features of West Bengal. Over 70.54% of inhabitants practice Hinduism, while more than one quarter practice Islam. Christianity and Buddhism are also in practice. The majority of the population are Bengalis along with some minority groups like Maithil, Bhojpuri and Marwari who are located various parts of the region. Buddhist and Nepali immigrants, as well as indigenous tribes, are also an essential part of the state [13]. The state officially recognized multiple official languages, like Bengali, Hindi, Odia, and Urdu. However, Bengali is the primary language spoken throughout the state [14].

**Tribal Population**

India is the residence of many Tribal people, who are still untouched by the lifestyle of the modern world and intensity of deprivations stratified them within a nutshell. In India, over 8.6% per cent of the populations as per the 2011 Census are scheduled tribes. Compared to other states of India, West Bengal secures total 5,296,953 no. Of Schedule Tribe population, this is 5.79 per cent among the total population [15]. There are forty-one schedule tribes groups, and most of them are concentrations in the southern, western and northern parts of the state. As per the 2011 census, over 93.9 per cent S.T. live in a rural area. Among the tribes, the Santals, Oraon, Mundas, Bhumijes and Koras,

Lodha's, Mahalis, Bhutias, Bedias, etc. are secured a sizable population <sup>[16]</sup>.

### Literacy Rate & Sex ratio of Tribal Populations

Government has taken up different welfare schemes for the educational development of Scheduled Tribes population. Literacy rate of S.T.s significantly increased from 6.55 per cent in 1961 to 57.93 per cent in 2011 in this state. The literacy rate of S.T. females is substantially lower than that of S.T. males. The fact is that only 0.6 per cent of tribal females in rural West Bengal obtained graduation level education (2011-12), so higher education is still a daydream

for the tribal population. The school dropout rate of S.T. students was alarmingly high due to some specific social causes. Specifically, for Classes I-X, the dropout rate was more than 80 per cent up to 2010 <sup>[17]</sup>. Gender disparity in literacy among S.T.s is also evident as the male literacy rate is 57.40 per cent as compared to the female literacy rate of 29.20%. The Bhutia has achieved the highest literacy rate of 72.60 per cent with 65.2 per cent female literacy. Among the Savars, female literacy is the worst at 16.0 per cent <sup>[18]</sup>. In West Bengal, according to 2011 census data overall sex ration among the tribal population is 974 which is higher than the national indicator (943).

**Table 3: Literacy Rate & Sex ratio (2011 census)**

State/ Districts -	% S.T. Population	Sex Ratio of Schedule Tribe Population	Literacy Rate (State/District Wise)	Literacy Rate of Scheduled Tribe Population
West Bengal	6%	974	69%	50%
Bankura	10%	972	63%	52%
Bardhaman	6%	978	69%	47%
Birbhum	7%	1003	62%	40%
Dakshin Dinajpur	16%	968	66%	50%
Darjiling	22%	962	72%	67%
Haora	0%	982	75%	63%
Hugli	4%	962	75%	54%
Jalpaiguri	19%	973	65%	51%
Koch Bihar	1%	943	67%	59%
Kolkata	0%	-	-	-
Maldah	8%	965	53%	40%
Murshidabad	1%	956	58%	44%
Nadia	3%	983	68%	50%
North Twenty Four Parganas	3%	986	77%	57%
Paschim Medinipur	15%	982	70%	52%
Purba Medinipur	1%	974	78%	56%
Puruliya	18%	970	57%	46%
South Twenty Four Parganas	1%	944	69%	52%
Uttar Dinajpur	5%	984	51%	36%

Source: (19, 20)

### Discussion

The above study on demography profile of West Bengal leads us to some of the exciting conclusion. It clearly shows that the birth rate, the death rate in West Bengal is not very high in recent decay. As a result, the natural decadal growth rate in West Bengal has declined 17.77 to 13.93 per cent, which is lower than the national growth rate. The high rate of literacy (77.08) in West Bengal than national average shows better improvement in education level, which helps the family planning programme. Still, this issue is concentrated in some pockets. There is a high need to increase awareness of family planning in the state from the grass-root level. Due to lack of better medical care of the mother during the pregnancy period, the maternal mortality rate is high till today. There should be an increasingly better medical facility up to panchayat level is necessary. Provide skill attendance at birth time at every institution and community level is required. 'Janani Suraksha yojana' (under "National Health Mission") must be implemented for safe motherhood intervention, with the objective reducing mortality by promoting institutional delivery among the poor pregnant women <sup>[21]</sup>. The infant mortality rate of this state is the relatively better situation due to implemented integrated management of childhood illnesses, infant mortality rate also reduces through Integrated Child Development Services (ICDS) mission to achieve NPP-2000 target. This programme is implemented through a

network of community- based Anganwadi centres from village level in all most all districts <sup>[22]</sup>. Some initiative should be taken such as- ensure access to quality maternal health services, provide skilled caregiver during childbirth, improving access to emergency services, encouraging community involvement and investment in maternal health care is still a necessity. The above discussion shows that West Bengal stands slightly above than national demographic achievement. There is a need to improve the existing health infrastructure and awareness to achieve the goals. Thus the demographic scenario of the state needs further in-depth analysis.

### Conclusion

Throughout the discussion, various aspects of population in West Bengal have been explored. From its early days of development, demography, economy, culture and society of this region are significantly affected by the growth of the birth rate. However, now the recent data reviled the fact that migration plays a crucial factor in the density of population in this state. Its vast population size shows the infrastructure base to withstand such pressure. The population growth rate is concentrated in some pockets mainly in the metropolis and its adjacent area, which increases the demand for services. Multi-ethnic population composition model for this state can simultaneously simulate population heterogeneity in the demographic (age-sex), socioeconomic (educational

attainment), and spatial dimensions from the grass route level.

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