

CHAPTER-VIII

DISTRIBUTION OF SEX RATIO BY ECONOMIC STATUS

8.1 INTRODUCTION

The term 'economic' refers in one way or another to business activity, jobs and money. Generally the word pertains to all activities, in which people engage, the world over, in the production, exchange or distribution and consumption of goods and services. Anything people buy, barter or work to produce or exchange is an economic item. To classify the various economic activities is may be in terms of a continuum from simple to complex, from the harvesting of fruits and nuts from nature's store house to creating them purposefully using modern agricultural practices. Therefore, economic activities may be classed into five broad categories, namely-

Primary activities—include age-old activities such as hunting animals and gathering wild berries and nuts; extracting minerals from the earth's crust; fishing from rivers, lakes, and oceans; and the harvesting of trees. People engaged in these activities are called red-collar workers due to the outdoor nature of their work.

Secondary activities—include manufacturing and commercial agriculture. In other words, these activities increase the value or the usefulness of a previously existing item by changing its form. As for example, farmer applies hybrid seeds, fertilizers and modern technology to increase the yield of crops, whereas steel makers turn iron into a more durable metal in blast furnaces etc. People engaged in these activities are called blue-collar workers.

Tertiary activities—include the service sector rather than tangible goods. This work refers to a range of personal and business services involving a rapidly growing share of the labour force in highly developed areas. Retail clerks, barbers, beauticians and secretaries all fall into the personal and business service categories and these people are often called pink-collar workers.

Quaternary activities—represent a special type of service work, focusing on professional and administrative services, including financial and health service work, information processing, teaching and government service as well as entertainment activity. Specialized technical, communication and motivation and leadership skills provide the common thread linking these activities. Practically all-quaternary activities occur in

official building environments or specialized environments provided by schools, theaters, hotels and hospitals and we think of this group as the white-collar work force.

Quinary activities—include chief executive officers and other top-management executives in both government and private sectors. Research scientists, legal authorities, financial advisers and professional consultants, who provide strategic planning and problem solving services belong to this cluster. Most of these activities occur in large urban centers or in close proximity to large university, medical or research centers. These workers are known as gold-collar workers.

In addition to these activities, people also engage in the exchange of items; whether it involves handling freight, wholesaling, storage, telecommunications or passenger movement, also play important roles in modern economics. A third aspect of all economic activity involves the consumption of goods and services. It refers to the final or direct use of goods and services to satisfy the wants and needs of human beings.

While each person in the population is a consumer of the goods and services that are available, only some proportion of the population participates in their production. The very young, the very old, as well as the physically and mentally incapacitated persons, are not useful for economic activity. It is therefore, accepted that only those, who can produce goods and services constitute the manpower of any nation. Thus, economically active population is that part of manpower, which actually takes part or tries to take part, in the production of goods and services. The economic and social development of a region depends on the number of persons, who are economically active. Not only that, the quality of their work, the regularity of their employment, the wage rate, engagement of women in labour force etc. also influence the development of the region. The type of economy and the stage of economic development, the region is passing through- also analyzed by the study of labour force of a region. Such studies provide the base on which national plans for social and economic development may be built and are, therefore, considered important for policy- makers and planners.

Therefore, for any region, economically active population determine, directly or indirectly the socio-economic development of the region. But, the participation rate in labour force varies from region to region. Not only that, the participation rate of

economically active population as region's labour force also varies with age and sex. As for example, while the participation rates, before age 25, increase with each successive age group as boys or girls leave schools and take up jobs; after age 45, the labour force participation rate declines with each successive age group and decline more sharply after age 65. This general trend again may vary based on the level of economy of the region. In agricultural economy, children start working at a very young age and consequently a very small proportion of children in agricultural societies continue to attend school up to the age of 14. On the other hand, the sex wise variation is also pronounced in labour force participation. Generally for all ages, female participation rate is much less than that of the men's. It should be noted that, as the majority of the females are housewives, they are engaged in productive activities only inside their homes. Despite the fact that, they undertake the important jobs of childbearing, child rearing and home making, they are not considered to be economically active. They are however, certainly not dependant on economy, as the children and the aged are. But, cultural setting and social customs also influence the female engagement in labour force.

All these factors and conditions can be observe in North Bengal as the region is physically, socially, economically as well as culturally a distinct area of its kind. Though the productive capacity of any area depends on the size of its labour force as well as on the proportion of the persons in the labour force to the total population, yet, the productivity of the workers and the rates of unemployment and underemployment are also important factors in this regard. Hence, in addition to the age-sex structures of labour force, the skills, the experience, the aptitudes, the education and the health of the workers are also considered to be the primary determinants of the productivity of the labour force. Apart from these, the occupational structure of the labour force, its distribution among various industrial sectors and its rural-urban and regional distribution within the country are all important factors.

8.2 GENERAL DISTRIBUTION OF ECONOMIC STATUS OF POPULATION IN NORTH BENGAL

In general, economic status means the status of an individual in terms of economic activity or economically gainful activities. The whole population of a region may be classified into economically active and economically nonactive population. The former

group is actually engaged in the production of goods and services, while the later comprises people, which are engaged in activities like household duties in their own house, retired personnel, inmates of institutions, students and those living on royalties, rents, dividends, pensions etc. The size of working force or economically active population depends on a variety of demographic, social and economic factors. Demographically, the birth rate, the age structure, the longevity of life, the migration behavior and the average size of the family are important. Socially, levels of literacy and education, status of women in the society, age at marriage and general health standards are significant. Economically, the type of economy, availability of employment opportunities and levels of income are vital.

In tune with other less developed states in India, West Bengal is characterized by a low participation rate in general. Despite some incidence of child participation, only 38.78 percent of the state's population was at work at the time of 2001 census. The figure is slightly more in the North Bengal region and 38.91 percent people were enumerated as workers (Appendix 8.1). This low proportion of working force or the high dependency ratio in the state as well as in the region is largely the product of the country's high rate of natural increase. Like the country and the state of West Bengal, the study region also is in the second explosive stage of the demographic transition adding millions of non-working children every year. Prejudices against female's participation in work are another crucial factor responsible for poor overall participation rates. Another similarity between these three regions is the wide disparity in the participation rates of males and females. During 2001, while about 54 percent of the state's males were recorded as workers, the corresponding figure for the female population was only 18 per cent. In North Bengal region, the female participation rate is slightly more than the state's average but in comparison to the developed areas, it is not good. The female participation rate has recorded as 24.16 percent, while male participation rate is 53 percent. The patriarchal system of the Indian society, the age old prejudices against female's mobility, prejudices against their education, their relatively low status in the society, frequent child births, limited job opportunities for them and limited desire on the part of the females themselves to participate in the economic struggle are the factors that have contributed to poor female participation in work in North Bengal in comparison to the male work participation rate. This is why, when one out of every two males in the region is working, it is one in every four females is in labour force. Thus, still in the

study region, the responsibility of earning the bread lies on the masculine shoulders while the females keep themselves occupied with the responsibility of baking the bread and looking after other domestic works, which the Indian census does not consider economically productive work.

Figure 8.1: - Work Participation Rate for Total, Main and Marginal Workers, 2001

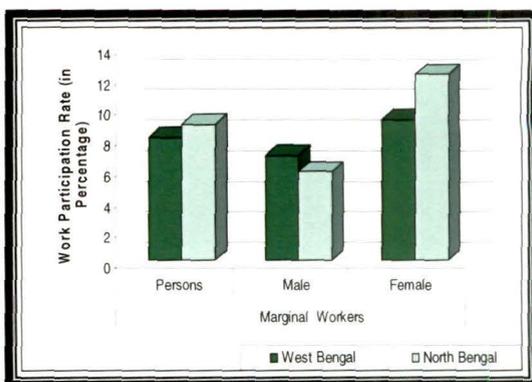
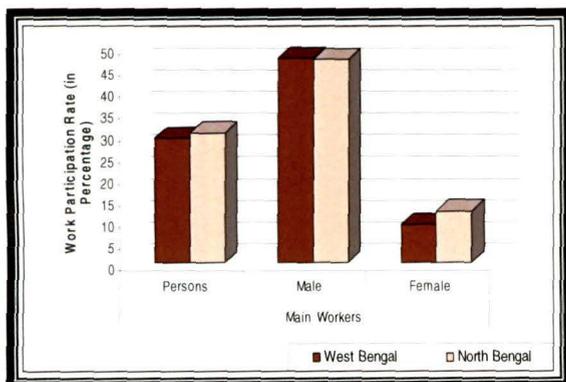
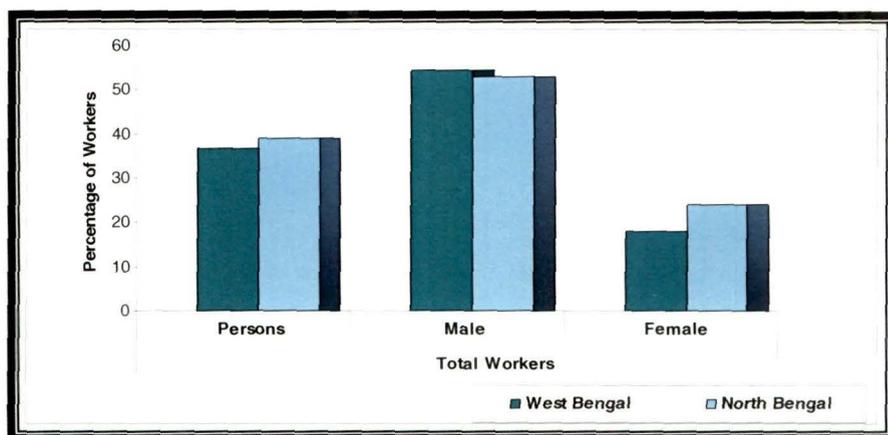
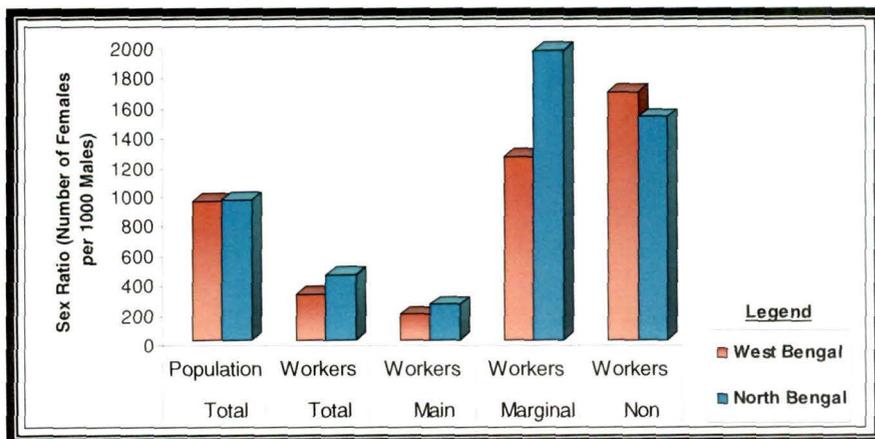


Figure 8.2: - Worker's Sex Ratio, 2001



However, in comparing the female participation rate between West Bengal state and the North Bengal reveals slightly high rate in the later. Main reason behind this is the high rate of female workers engaged in various occupations as marginal workers. Besides, the hill district of Darjiling shows relatively high rate of female workers due to rapid rate of male out migration. Appendix 8.1 shows the differential work participation rate for both males and females in the state as a whole as well as in the study region. Among the total population of these two regions, according to the Appendix 8.1 work participation rate for the male as main and marginal workers are more or less similar. But the main difference is in the case of female participation rate as main and as marginal workers. In both of these cases, female participation rate in North Bengal is much higher than that in the whole state and it is 3.11 percent point more in case of main workers while it is 2.98 percent point more in case of marginal workers. Though female work participation rate in North Bengal as a whole is slightly more than that of the state's average for both main and marginal workers, but the number of females engaged in various economic activities in the whole region is very low. In other words, only 11.97 percent of whole female population of the region are economically active and engage as main workers while only 12.20 percent are engage in different marginal activities.

8.3 GENERAL DISTRIBUTION OF WORKER'S SEX RATIO AMONG DISTRICTS IN NORTH BENGAL

Work is the most important and primary human activity. Generally, work is any activity or spending of energy that produces services and products of values. The Population Census definition on work is restricted to the activities of economically productive work. The Population Census of India, 2001 defines work (economic activity) as participation in any economically productive activity with or without compensation, wages or profit. Such participation may be physical and/or mental in nature. Work involves not only actual work, but also includes effective supervision and direction of work. It even includes part-time help or unpaid work and farm or family enterprise or any other economic activity.

Information on work and economic activity of the individual was collected in India right from the 1872 population Census. However, the concepts and definitions of economic activities underwent changes from time to time, although efforts were made to maintain uniformity and comparability to the extent possible. In the first post-independence population census of 1951, the population was classified as workers and non-workers, based on the income approach, and persons were classified as 'self-supporting', 'self-dependants', and 'non-earning dependants'. The first is defined as a person who is in receipt of an income, whether in cash or kind, sufficient at least for own maintenance. A non-earning dependant is a person who does not secure any income and is wholly dependant on the earnings of someone else. An earning dependant is a person, who secures a regular income, but whose income is not sufficient to support him/her. In the 1961 census of population, economic data were collected on the basis of work. 'Work' was defined as "any person whose activity was participation in any economically productive work either by him/her physical or by mental activity". Workers are those persons, who worked on any one of the days during the reference period of one week prior to the date of enumeration, if the person had participated in any activity like trade, profession, service or business. Seasonal works like cultivation, livestock keeping, plantation, some types of household industry etc., which are not carried on throughout the year, were also considered as work. And the same concept was followed in the 1971 Census. However, in 1981, the criteria of work were based on the duration of hours and days. The entire population is divided into three categories, 'main workers', 'marginal workers' and 'non workers'. The first is defined as one, who has worked in some economic activity over a period of six months, while the second type covers those, who had worked any time at all in the year preceding the enumeration, but had not worked for the major part of the year. Non-workers were those, who had not participated in any gainful work preceding enumeration. The categories included under non-workers are housewives, students, dependants, retired persons, beggars and vagrants, inmates of jail and mental institutions. In the 1991 census, the time criteria regarding engagement in work remained the same in both cases of main and marginal workers. Even the definition of work was unchanged, but here the workers included those, who did unpaid work on farm or in family enterprises in order to account for women, who do not receive any remuneration for work. The Census classified the main economic activities into nine industrial categories. These are- (I) Cultivators, (II) Agricultural Labourers, (III)

Livestock, Forestry, Fishing, Hunting, Plantations and Orchard and Allied activities, (IV) Mining and Quarrying, (V) Manufacturing, Processing, Servicing and Repairs in a) Household Industry and b) Other than Household Industry, (VI) Constructions, (VII) Trade and Commerce, (VIII) Transport, Storage and Communication and (IX) Other Services. All the nine industrial categories of main workers can be grouped into three economic sectors, i.e., Primary, Secondary and Tertiary. Primary sector covers industrial categories of I, II, III and IV; while the Secondary sector includes Va and Vb and VI. The Tertiary sector comprises of VII, VIII and IX. However, this categorization into three economic sectors is based on the nature of the production process of the commodity or commodities produced in the particular sectors.

Thus, an important characteristic of Indian occupational structure is very low female participation rate. Like many other state, West Bengal also follows the same character of the nation. Though in the study region, female participation rate is slightly more than the state's average, yet it is not good, it is only 6 percent more than that of the state's average (Appendix 8.1). It is mainly the status of women along with low female literacy in the society and consequent approval or disapproval of female participation in activities outside the four walls of the house, as the cause of this low female participation in work in whole North Bengal region. As women constituting almost half the population of the region, thus low female participation results in low proportion of total work force. According to 2001 census, only 437 females for every 1000 males in the whole North Bengal are engaged in different main and marginal activities. In the whole state, the sex ratio has recorded 311 females per 1000 males in the work force. This difference is due to rural character of North Bengal than the southern part of the state as rural areas involve more female workers in various unskilled agricultural activities. Therefore, this slightly more female participation rate in North Bengal does not indicate any social and economic development of the region.

Table 8.1 shows that, while about 86 percent people of North Bengal live in rural areas, in the whole state, the figure is about 72 percent. This rural character of the study region again act as a push factor to force educated and skilled men to migrate to urbanized southern portion of the state as well as in other states of the country. Thus the slight high sex ratio among total workers, main and marginal workers in North Bengal is negligible comparing with the whole state in terms of socio-economic development of both areas.

However, the table reveals that, in North Bengal, female workers concentrate mainly in marginal activities and are about double in number than the males in these activities. Whereas only 246 females for every 1000 males are working as main workers, more than 1900 females per 1000 males participate in region's labour force as marginal workers. Such a high proportion of females as marginal workers in the region indicate that, during the peak time of harvesting and other agricultural as well as various household activities, as women play important role in agriculture. These female workers are not directly engaged with cultivation all the year round rather during a particular season, they engage as workers in rural areas. This is why, in North Bengal, about double the number of females than the males are engaged as marginal workers while their engagement as main workers is about one-fourth of the male participation.

The district wise figure shows that, Maldah district occupies first position in terms of sex ratio among total workers. About 510 females per 1000 males are engaged in various agricultural and non-agricultural activities of the district. Uttar and Dakshin Dinajpur follow it in terms of sex ratio for total workers. Dakshin Dinajpur, which records highest sex ratio for total population in 2001, stood in the third highest position in case of sex ratio for total workers with 430 females per 1000 males. This means, where 951 females are there in the district per 1000 males in total population, only 430 are in labour force per 1000 males. The lowest sex ratio among total workers is recorded in Koch Bihar district with only 384 female workers per 1000 male workers. This low sex ratio in Koch Bihar district is attributed due to very low female participation as main worker. Only 179 females engage as main workers per thousand males in the Koch Bihar district, which is the minimum female participation in the whole region. On the contrary, the maximum sex ratio for main workers is recorded in Darjiling with about 333 females. This mountainous district reveals the record of 413 females as total workers per 1000 males with female participation rate of about 21 percent. Generally, due to its mountain character and rugged topography, people are unable to practice agriculture in all areas in the district rather confined to a limited area of the southern and eastern part. This is why, this district of North Bengal possesses the lowest percentage share of rural population (about 68 percent) in the whole region and one-tenth of the total population of the region. However, in terms of sex ratio for main workers Darjiling is followed by extreme southern district Maldah, where about 282 female workers engage against every thousand male workers as main worker. This is a Muslim majority district and about 510

is the sex ratio for total workers. Only about 47 percent of total female workers are engaged as main workers against the male worker's share of 85 percent in the district. The third highest sex ratio among main workers is recorded in Jalpaiguri district. Though about 29 percent of total area of North Bengal is occupied by this district, but due to Terai and Duars forest belts as well as moist foothills environment, development of agriculture do not take place properly. As this environment supports tea plantation, hence high numbers of females work in these tea gardens. Though Koch Bihar records very low sex ratio in case of main workers, but in case of marginal workers, the participation of females per thousand males is maximum in this district.

Table 8.1: - Sex Ratio for Total Workers in North Bengal, 2001

Classes of Sex Ratio (Number of Females per 1000 Males)	Total Number of C.D. Blocks in each Class	Percentage of C.D. Blocks to total C.D. Blocks in North Bengal
250 and below	4	5.80
251-400	22	31.88
401-550	27	39.13
551-700	12	17.39
701-850	3	4.35
851 and above	1	1.45

Source: - Calculated from PCA, 2001

The sex ratio for marginal workers is recorded about 2615 in Koch Bihar district followed by Dakshin Dinajpur with about 2307 females per thousand males. However, the minimum sex ratio is recorded in Darjiling district with 1065 females per 1000 males. The distribution of sex ratio among non-workers reveals that, there is not much variation in this field. It varies from minimum of 1431 in Darjiling to maximum of 1637 in Koch Bihar. This means female unemployment rate is maximum in Koch Bihar followed by Dakshin Dinajpur.

Table 8.2: - Sex Ratio for Total Workers (based on the region's average),2001

	Below Region's Average (<432 females per 1000 males)		Above Region's Average (>432 females per 1000 males)	
	Number of C.D. Blocks	Percentage of C.D. Blocks in district	Number of C.D. Blocks	Percentage of C.D. Blocks in district
Darjiling	5	41.67	7	58.33
Jalpaiguri	7	53.85	6	46.15
Koch Bihar	8	66.67	4	33.33
Uttar Dinajpur	4	44.44	5	55.56
Dakshin Dinajpur	5	62.50	3	37.50
Maldah	6	40.00	9	60.00
Total	35		34	

Source: - Calculated from PCA 2001

8.4 DISTRIBUTION OF SEX RATIO AMONG WORKERS- BLOCK LEVEL ANALYSIS

The C.D. Block level distribution of sex ratio among workers depend on various factors including Availability and non-availability of fertile soil, irrigation water, suitable terrain as well as favourable climate are mainly responsible for variation of work in every block. This variation of physico-cultural conditions of different parts of the region also influences the attitude to people to participate in the labour force of the whole region. Moreover, the social condition also responsible for the variation in male-female participation rate in these blocks. However, maximum sex ratio among workers can be found in some of the northern and southern blocks of North Bengal. The sex ratio, not only indicate the number of females, but also the attitude of the society towards its womenfolk. In general, the sex ratio among total workers ranges from maximum of 910 in Kaliachak-I to minimum of 153 in Haldibari. These two extremes are exception of its kind, as there is only one block in the region with sex ratio of above 900 and only one block with sex ratio of below 100. Thus, to understand the sex structure of work force of

the whole region, analysis of sex ratio for all blocks is vital. Table 8.1 reveals the distribution of sex ratio among total workers in North Bengal.

Figure 8.3: - Worker’s Sex Ratio in North Bengal, 2001- District wise Variation

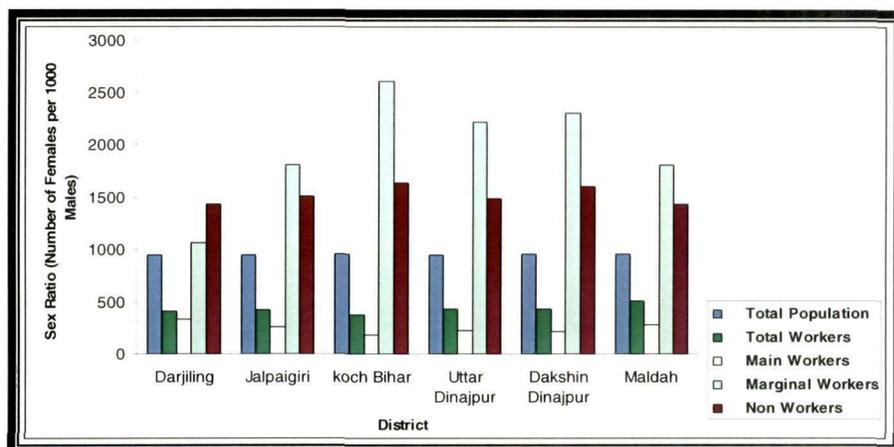
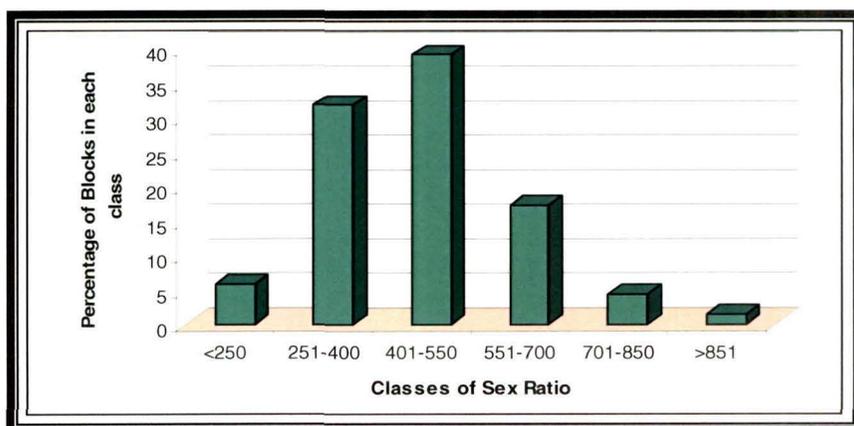


Figure 8.4: - Sex Ratio among Total Workers in North Bengal, 2001- Block Level Analysis



The Table 8.1 shows that, maximum concentration of blocks is in the class 401-550. About 39 percent blocks of the whole North Bengal show their sex ratio among total workers in this class. This is why, the average sex ratio for the whole North Bengal in case of total workers also record in this range. This dominant class, where 27 blocks out of 69 record their names ranges from minimum of 404 in Bansihari to maximum of 549 females per 1000 males in Madarihat. With maximum of 63 percent concentration of blocks in this range Dakshin Dinajpur ranks first, yet one of its blocks (Bansihari) record minimum sex ratio in this class. This district is followed by Uttar Dinajpur and Darjiling with the concentration of blocks in this group as 44.44 percent and 41.67 percent

respectively. The concentration of blocks in eastern two districts in this range of worker's sex ratio record 38% in Jalpaiguri and 33% in Koch Bihar. The extreme southern district records only 27 percent of its blocks in the sex ratio group of 401-550. Thus, though maximum concentration of blocks of whole North Bengal lies in the range of worker's sex ratio of 401-550, but the share of each district varies widely depending on various other conditions. Out of these 27 blocks lies in this range, only seven blocks record sex ratio among workers of more than 500 females per 1000 males. These are Madarihat, Kumargram, Mal, Kurseong, Karandighi, Darjeeling–Pulbazar and Tapan. Most interesting fact about these seven blocks are five blocks have rural population of more than 90 percent while the remaining two have rural population of more than 50 percent. Apart from these seven blocks, remaining 20 have recorded sex ratio among total workers of below 500 females per 1000 males.

If we take the North Bengal's average sex ratio of workers as the middle one, then all the 69 blocks will be divided into two groups based on this region's average of 437 females per 1000 males. It shows that about 51 percent blocks of North Bengal have sex ratio less than the region's average while remaining 49 percent blocks record sex ratio more than the region's average of 437 female workers per 1000 males. Among all of six districts of North Bengal, maximum concentration of blocks is found in Maldah district, where 60 percent blocks record worker's sex ratio of more than the region's average. Maldah is followed by Darjiling and Uttar Dinajpur with sex ratio of 58 and 56 percent respectively in the above region's average group. Other remaining three districts record sex ratio among workers more than the region's average. On the other hand, maximum concentration of blocks in below region's average group is from Koch Bihar District with about 67 percent of its block in this group. Among other districts recorded in the below average group, second highest concentration is found in Dakshin Dinajpur district followed by Jalpaiguri district where sex ratio has recorded as less than region's average by 63 and 54 percent blocks respectively.

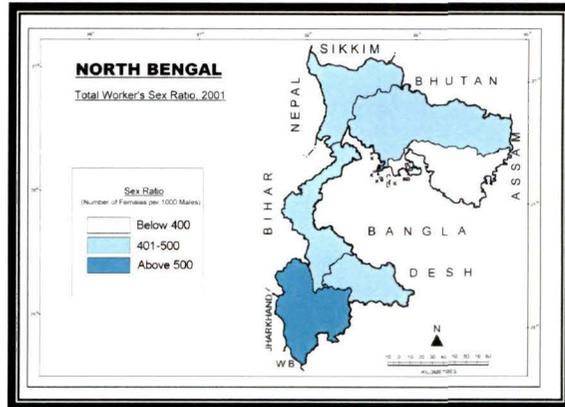
Now, if we consider district wise distribution regarding their block's contribution in sex ratio among total workers, then variation in female participation rate in working force of individual blocks of individual districts will be clearly depicted. Darjiling is a hilly district and some portion of this district is covered by rugged and undulating terrain which is in some places so uneven that become inaccessible due to existence of very high

peaks of the great Himalayan mountains; work participation rate for both males and females are also low in this district. About 35 percent people including both males and females are engaged in various economic activities as workers. Out of total male population of the district, about 49 percent and about 21 percent of total females of the district have registered their name as workers in the 2001 census. These are the lowest among whole North Bengal. Thus obviously sex ratio among total workers also low than that of the region's average of 437 females per 1000 males. In this northern district, about 413 females are engaged in labour force against every 1000 male workers. Though, female work participation rate in whole population of the district is tremendously low, yet there is much variation in sex ratio of total workers within the 12 blocks. The sex ratio varies from maximum of 737 in JoreBunglow- Sukhiapokri to minimum if 200 in Matigara. Along with the former, Mirik also record sex ratio of more than 700. Thus, these two high sex ratio recording blocks are concentrated on the middle part of the western corner of the district. These two blocks possess much concentration of tea gardens where, majority of workers are females. On the northeastern corner of the district another comparatively high small sex ratio region can be seen. It is one block in the northeastern corner of the district and that is Gorubathan, where about 683 female workers are there per 1000 male workers. In some blocks of this district, low sex ratio is recorded ranging from 500 to 600 females per 1000 males and out of total 12 blocks of Darjeeling, about 33 percent record worker's sex ratio in this group. Phansidewa, Kharibari, Naxalbari and Matigara- these four southern blocks with one bordering Bangladesh and two bordering Nepal with a hilly block Kalimpong-I, record very low number of female workers, where the sex ratio is much below 500 and maximum concentration (about 42 percent) of blocks occur in this very low group.

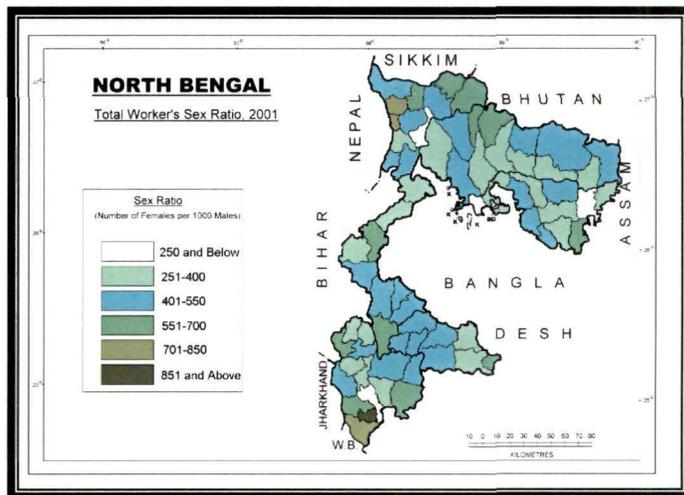
The foothill of the Himalayas is covered by forest and is called as Terai and Duars, which covered the northern part of the Jalpaiguri district also. Some timber industry is in this region. Apart from this, people are engaged in gathering products from forests, as labours in tea gardens and obviously as agricultural workers. However, having more area (about 29 percent of whole region) and more population (about 23 percent of whole region), the Jalpaiguri registered only 38 percent of its population as workers with male and female work force as 53 percent and 23 percent respectively. Occupying about 23 percent of whole study region's female population Jalpaiguri records only 424 female

workers for every 1000 male workers. Among all of 13 blocks, Rajganj- the western most block have lowest sex ratio of 253 females per 1000 males in work force.

Map 8.1: - Distribution of Total Worker’s Sex Ratio, 2001-District Level Variation



Map 8.2: - District Wise Variation of Sex Ratio among Total Workers In North Bengal



On the contrary, two northern blocks, full of numerous tea gardens, record high to moderate sex ratio in working class. These two are Nagrakata and matiali, where workers sex ratio is more than 650 females per 1000 males. Two other blocks namely Madarihat and Mal also occupying tea gardens and forest areas of the foothills; the sex ratio recorded as 549 and 542 respectively. Kumargram, the northeast corner block bordering Bhutan and Assam also record similar engagement of females like Mal and Madarihat with a sex ratio of 546. Therefore, only 38 percent blocks of this district registered

workers sex ratio more than 500 females per 1000 males and remaining about 62 percent are showing very poor female participation in relation to males in the work force. All of these blocks registering very low sex ratio among workers are located in the southern part of the district. Only exception is the Kalchini, which is inspite of located in tea garden's belt and foothill region of the Duars, registered low participation of female workers per 1000 male workers.

In case of Koch Bihar district, the sex ratio among workers is 380 females per 1000 males and this is the lowest in North Bengal. It is interesting to note that all the southern blocks of Jalpaiguri district have a trend of low female workers in working class in relation to 1000 males and these southern blocks are located on the northern boundary of the Koch Bihar district. As a consequence, majority of blocks of this district have a very low sex ratio of working class and a very low overall district's sex ratio. However, block wise sex ratio varies from maximum in Dinhata-II to minimum in Haldibari with 623 and 146 respectively. Not only that, Haldibari records lowest sex ratio among workers in whole North Bengal. Thus, only Dinhata-II, have sex ratio more than 500 female workers per every 1000 male workers during the year 2001. The blocks registered very low sex ratio with Haldibari, are Tufanganj-I and Koch Bihar-I, where the sex ratio is extremely of below 300 females per 1000 males of total work force. Having more than 70 percent rural population, these blocks record very low number of females in work force. In addition to this, the female work participation rate is also very low in these blocks and it is only 8 percent for Haldibari, whereas about 14 and 15 percent of total females of the blocks are in work force in Tufanganj-I and Koch Bihar-I respectively.

About 427 females against every 1000 males are there in Uttar Dinajpur's work force. The maximum and minimum sex ratios are recorded in Itahar with 626 and Chopra with 262 respectively. Thus, in Uttar Dinajpur district, highest sex ratio is found in extreme southern part whereas minimum is found in extreme northern part. However, the workers sex ratio increases from northern corner of the district towards south. Two middle blocks i.e. Goalpokhar-I and Karandighi record relatively more female workers, but the sex ratio again decreases toward south with maximum increase in extreme southern end.

Though, in Dakshin Dinajpur district, the sex ratio among workers is 425, which is the third highest in North Bengal, but there is only one block where sex ratio is above 600.

This block is situated in the extreme southeast corner bordering in its two sides by Bangladesh and it is the Hilli, while minimum sex ratio is recorded in Kumarganj with only 279 female workers per 1000 male workers. Tapan is the only block with sex ratio between 500 and 600. About 75 percent blocks of this district have registered workers sex ratio below 500.

Maldah district having maximum sex ratio among total workers in North Bengal ranges in its blocks from maximum in Kaliachak-I to minimum in English Bazar with 911 and 249 respectively. In the former, sex ratio is exceptionally very high. In spite of Muslim dominance, sex ratio among workers in Kaliachak-I, Kaliachak-II and Kaliachak-III is high. Another block situated in eastern corner, i.e., Habibpur also records high to moderate sex ratio of above 650. Except northern block, namely Harishchandrapur-II, all of total 67 percent blocks covering whole northern and central part of the district record very low sex ratio with Chanchal-I, Harishchandrapur-I and English Bazar as extremely low sex ratio among total workers during 2001 census (Map 8.2).

8.5 DISTRIBUTION OF SEX RATIO AMONG MAIN WORKERS- BLOCK LEVEL ANALYSIS

Since 1981 Population Census in India, the criteria of work were based on the duration of hours and days. The entire population is divided into three categories, 'main workers', 'marginal workers' and 'non workers'. The main workers are those, who have worked in some economic activity over a period of six months or more. As North Bengal is a region with mainly rural in character, hence the major proportion of work force is related with various activities of agriculture. But as agricultural activities do not need workers for all over the year due to seasonal cropping pattern of the region and thus as a consequence the participation of workers as main work force is low in the whole region. Above all, due to the engagement in several agricultural activities only during some particular peak season like at the time of harvesting etc. female participation rate in agriculture as main workers also very low.

Table 8.3: - Sex Ratio for Main Workers in North Bengal, 2001

Classes of Sex Ratio (Number of Females per 1000 Males)	Total Number of C.D. Blocks in each class	Percentage of C.D. Blocks to total C.D. Blocks in North Bengal
200 and below	29	42.03
201-350	24	34.78
351-500	9	13.04
501-650	5	7.25
651 and above	2	2.90

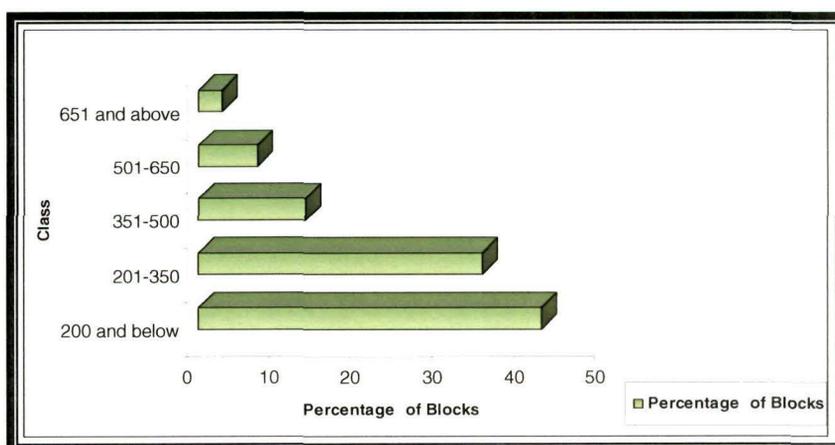
Source: - Calculated from PCA, 2001

**Table 8.4: - Sex Ratio for Main Workers (based of the region's average),
2001**

	Below Region's Average (<240 females per 1000 males)		Above Region's Average (>240 females per 1000 males)	
	Number of C.D. Blocks	Percentage of C.D. Blocks in district	Number of C.D. Blocks	Percentage of C.D. Blocks in district
Darjiling	3	25.00	9	75.00
Jalpaiguri	6	46.15	7	53.85
Koch Bihar	12	100.00	0	0.00
Uttar Dinajpur	5	55.56	4	44.44
Dakshin Dinajpur	7	87.5	1	12.50
Maldah	11	73.33	4	26.67
Total	44	63.77	25	36.23

Source: - Calculated from PCA, 2001

**Figure 8.5: - Block Wise Distribution of Sex Ratio among Main Workers in North
Bengal, 2001**



Appendix 8.1 shows that, only about 12 percent females are accounted as main workers as per 2001 census against about 47 percent of male main workers. As per 2001 Census Data, sex ratio for total main workers in whole North Bengal was recorded as 240 females per 1000 males and it was about 175 for the whole state. However, within the North Bengal region, sex ratio for main workers varies from minimum of 179 females per 1000 males in Koch Bihar district to maximum of 333 females per 1000 males in the Darjiling district. Maldah and Jalpaiguri, being the second and third highest, also records main worker's sex ratio above the region's average. Hence, remaining three including, Koch Bihar, reside on the below average group.

Among all of 69 Community Development Blocks of the North Bengal region, the sex ratio varies between maximum of 728 in Jorebunglow- Sukhiapokri and minimum of 102 in Ratua-I block. Therefore, there is a wide gap between the highest and the lowest sex ratio in case of main workers. If we divide this gap into five classes of below 200, 201-350, 351-500, 501-650 and above 651, then number of blocks showing sex ratio among main workers in each class reveal accurate picture of female work force as main workers in the districts as well as in the whole study region.

The differential sex ratio of main workers in each block reveals the condition of female work participation in the whole region. The table 8.3 shows that maximum concentration of blocks is in the lowest class of below 200 females per 1000 males in main workers, where about 42 percent blocks of whole North Bengal lie. This indicate that the female participation rate in majority of blocks of the region is very low and against every 1000 male workers female participation as main workers is less than 200 females. This is mainly due to low female literacy, low status of women in society, lower age at marriage leading to high fertility as well as high negligence of girl child etc. Thus, majority of blocks of North Bengal record very low number of female main workers and as a result, the overall participation rate of total population in main activities and as main workers also very low. In this group of very low sex ratio, major concentration of blocks are contributed by the Koch Bihar district where about 31 percent of all blocks of this lowest group concentrate accounting 9 out of 29 blocks in this group. Therefore, in about 75 percent blocks of Koch Bihar district record sex ratio of main workers less than 200 females against every 1000 males. On the contrary, minimum concentration is in Darjiling district, of which only 1 block shows sex ratio in this group of below 200.

Apart from Koch Bihar, another important concentration of blocks are found in Dakshin Dinajpur where 63 percent blocks come in this category with less than 200 females. per every 1000 male among main workers (Appendix).

Next to this are two districts of Maldah and Uttar Dinajpur with 44-47 percent blocks in this group. Therefore, these three southern districts, i.e., Uttar Dinajpur, Dakshin Dinajpur and Maldah together constitute more than 55 percent blocks of whole North Bengal registering main worker's sex ratio of less than 200 females per 1000 males. About 35 percent blocks of whole North Bengal record main worker's sex ratio between 201-350 females per 1000 males. In this class of sex ratio, maximum concentration of blocks in Uttar Dinajpur district, of which about 56 percent blocks record number of females for every 1000 males among main workers ranging between 201 and 350 females per 1000 males. Except this district, in remaining five districts, the cluster of blocks having sex ratio in this group varies from 25 – 38 percent. It should be noted that, all blocks of Koch Bihar, Uttar Dinajpur and Dakshin Dinajpur record sex ratio among main working class below 350. It means, very low female workers are there in main work force in these three districts against every 1000 male main workers. In other words, main cluster of blocks in below 350 sex ratio of main workers is found in the middle part of the North Bengal region covering about 77 percent of all blocks of the region as well as cent percent blocks of three districts mentioned above and 40 – 75 percent blocks of Darjiling, Jalpaiguri and Maldah districts.

Next important cluster of blocks is found in the range of sex ratio between 351 and 500 females per 1000 males. In this range, about 13 percent blocks of North Bengal lie covering 4 from Darjiling, 3 from Jalpaiguri and 2 from Maldah. Total middle portion of the North Bengal is missing in this range. However, among these three, maximum concentration of blocks are found in Darjiling district followed by another northern district, Jalpaiguri while the southern most district shows only 13 percent blocks of its total 15 having main workers sex ratio varies between 351 and 500.

Next important agglomeration of blocks are seen in the range of sex ratio of 501 – 650 where about 7 percent blocks of North Bengal lie. Among these Darjiling's contribution is 17 percent of its blocks, Jalpaiguri's is 15 percent while only 7 percent blocks of whole Maldah district lie in this range. In the next group, i.e. in the high group of sex

ratio, only two blocks are there one from the northern most district and another from the southern most district accounting only about 3 percent of the total blocks of North Bengal.

In the below average group (North Bengal region's average of 240 females per 1000 males), about 64 percent blocks of whole region gather while in the above average group only 36 percent of blocks record their name. Cent percent blocks of Koch Bihar, 88 percent of Dakshin Dinajpur, 73 percent of Maldah, 56 percent of Uttar Dinajpur record main worker's sex ratio in this group. Only exception is in the Northern two districts where majority of blocks have main workers sex ratio more than regions average of 240 females per 1000 males. About 75 percent of Darjiling and 54 percent of Jalpaiguri are on the above the region's average side of sex ratio (Table 8.4).

Therefore, it is the northernmost hilly district, where maximum number of blocks record sex ratio among main workers more than the region's average of 240 females per 1000 males. There is one block in Darjiling district, where the sex ratio is comparatively high, i.e., more than 700 females per 1000 males and it is the Western block namely Jorebunglow–Sukhiapakri. It is followed by another western block, i.e., Mirik where about 643 females are work as main worker for every 1000 male main workers. Due to maximum number of female main workers, these two blocks have maximum sex ratio among total workers in the whole district. Thus these two blocks registered main worker's sex ratio of moderate high and high. Remaining 83 percent blocks of the district have a trend of sex ratio moderate to low. One block, that is Matigara, have recorded main worker's sex ratio below 200 female per 1000 males i.e., very very low number of females engaged as main worker. This is mainly due to maximum concentration of urban population in this block with part of Siliguri Municipal Corporation. Closely located to this block, Naxalbari, Kharibari, Phansidewa also have very low female participation in labour force as main worker. As Siliguri is the main urban centre of the region, all of these blocks also depend on the city related activities. As a result of high male dominated migration, the overall sex ratio in these blocks is also very low with only 881 in Matigara. With about 952 and 925 females per 1000 males in whole population, Kalimpong–I and II blocks also record low females as main workers. Therefore, in other words, about 50 percent blocks of Darjeeling district, mainly occupying the southern and central part of the district, very low numbers of females participate in labour force as

main workers. On the contrary, the northwestern section of the district is occupied by comparatively moderate to high sex ratio recording blocks in terms of main workers with one block, i.e., Gorubathan situated in the extreme northeastern corner of the district (Appendix 8.7).

Jalpaiguri is another district with more than half of its blocks register sex ratio among main workers more than the North Bengal's average of 240. The sex ratio varies from maximum of 533 females per 1000 males in Nagrakata to minimum of 139 females per 1000 males in the Mainaguri block. Nagrakata along with Matiali form the group of moderate sex ratio of 501-600. Though more than half blocks in this district have sex ratio above regions average, yet there is not a single block with sex ratio more than 600. But three blocks of the southern boundary, i.e., Mainaguri, Rajganj and Alipurduar-II record very low sex ratio of below 200 females per 1000 males. About 31 percent blocks of this district shows main workers sex ratio of very low range between 201 and 300. Therefore, about 54 percent blocks of this district record main workers sex ratio of below 300. It should be mentioned that all of these blocks are located along the southern boundary of the district.

In the Koch Bihar district, very low overall sex ratio can be seen. In this district, average sex ratio for the main workers has recorded as only 173 females per 1000 males. No block is there with sex ratio of main workers more than 300. Thus, the block wise distribution of sex ratio of Koch Bihar varies from maximum of only 232 females per 1000 males in Mathabhanga – I to minimum of 105 in Haldibari block. About 75 percent blocks register main worker's sex ratio as low as below 200 females per 1000 males. This extremely low sex ratio results into very low sex ratio among total workers of the district.

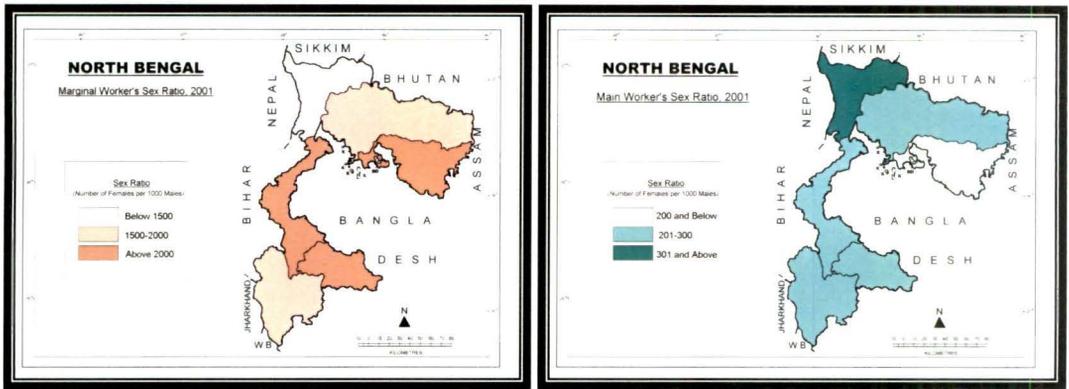
Though, the district's average sex ratio for main workers is slightly high in Uttar Dinajpur district than that of the Koch Bihar, but the variation is like those of the later. As Koch Bihar, the block wise variation of sex ratio among main workers in Uttar Dinajpur district varies below 300. The maximum sex ratio is found in Goalpokhar – I, where only 293 females are engaged as main workers against every 1000 male main workers. On the contrary, Goalpokhar – II records the lowest sex ratio among main workers and it is 131. In the northern part of the district the main worker's sex ratio is

comparatively low and in southern blocks it is relatively slightly more. Though Itahar has only 233 female main workers per 1000 male main workers, the sex ratio for total workers is quite high of about 626 mainly due to high female workers in marginal workforce.

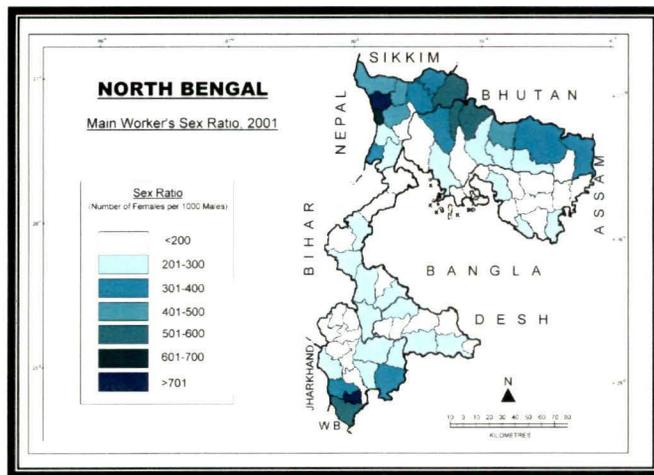
About 233 females are engaged in main workers group against every 1000 males in Dakshin Dinajpur district. Maximum and minimum sex ratio among main workers is recorded in Balurghat with 244 and Bansihari with 163 females per 1000 males respectively. About 63 percent blocks of this district records sex ratio of less than 200 females per 1000 males.

With a sex ratio of 277 among main workers, Maldah occupies the second position in the whole North Bengal following Darjiling. The maximum sex ratio is observed in the Kaliachak – I block where 722 female main workers are there per 1000 male main workers. The minimum sex ratio has recorded in Ratua – I block, where 102 female workers engage as main workers for every 1000 male workers. Therefore, there is a wide gap between the maximum and the minimum sex ratio among main workers. However, only Kaliachak – I records sex ratio of more than 700 females per 1000 males. It is followed by Kaliachak – III, i.e., another southern block of the district with a sex ratio of 508. That means, between highest and second highest sex ratio, there is also large gap of more than 200 points. The later is followed by another southern block, namely Kaliachak – II with 395 female main workers per 1000 male main workers. These three southern most blocks along with another northeastern block of the district, i.e., Habibpur form the group of sex ratio of more than 300 (Map 8.4). Therefore, about 73 percent blocks of the district record main worker's sex ratio less than 300 females per 1000 males. Among these low sex ratio blocks, six blocks, situated in the northwestern corner of the district record extremely low sex ratio along with middle block English Bazar. These have sex ratio below 200 females per 1000 males (Appendix 8.7).

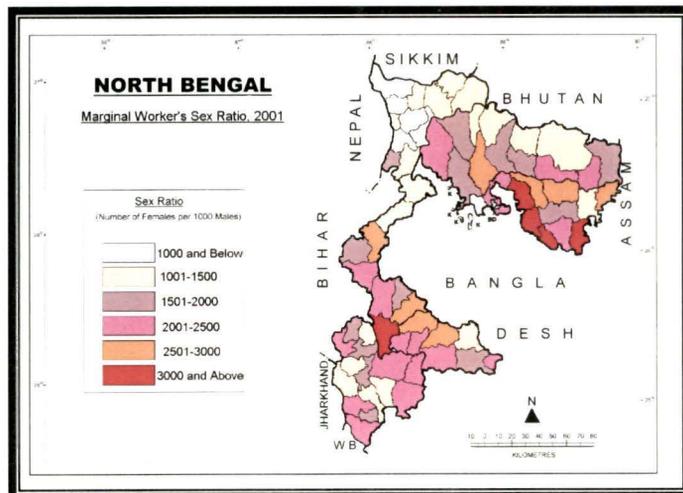
Map 8.3: - Distribution of Sex Ratio among Main and Marginal Workers in North Bengal, 2001



Map 8.4: - Block Wise Variation of Sex Ratio among Main Workers In North Bengal



Map 8.5: - Block Level Variation of Sex Ratio among Marginal Workers In North Bengal



8.6 DISTRIBUTION OF SEX RATIO AMONG MARGINAL WORKERS- BLOCK LEVEL ANALYSIS

About 9 percent population of whole North Bengal is engaged as marginal workers while the percentage for males is only 6 percent and for females it is 12 percent. Therefore, in the whole North Bengal region, more females are engaged as marginal workers. But comparing with the engagement of both males and females together as main workers, the same for marginal workers is very low. It remains same for male workers also. But though female participation rate as marginal workers is slightly more than that of the main workers, the percentage of females engaged in work force in both the cases is very negligible. However, in case of marginal work force, in all the districts like the region as a whole, females predominate in number over the males. In the whole North Bengal region, about 1952 females have recorded as marginal workers per 1000 males during the census enumeration of 2001. The figure was 1245 in case of the state as a whole.

However, in case of districts, the sex ratio varies from maximum of 2615 females per 1000 males in Koch Bihar to minimum of 1065 in Darjiling (Appendix 8.4). Therefore, there is a wide gap between district wise distributions of sex ratio of marginal workers. Dakshin and Uttar Dinajpur also recorded marginal worker's sex ratio of more than 2000 (Map 8.3).

Like the district wise distribution the gap between maximum and minimum sex ratio among marginal workers of blocks also quite large. It varies from maximum of 3494 females per 1000 males in Sitai to minimum of 762 females per 1000 males in the Naxalbari block. It should be mentioned that the former is in the Koch Bihar district, and later is in the Darjiling district. However, if we classify this large gap into some classes, then the block wise distribution will be easily understood.

As per the 2001 Census, majority of blocks of North Bengal supports sex ratio among marginal workers varies between 1001 and 1500 and about 28 percent blocks of the region fall in this group. In this group, maximum concentration of blocks is found in Darjiling district, which records its half blocks falling in this group followed by Jalpaiguri with 31 percent blocks. Next concentration is found in extreme south district, i.e., in Maldah, which supports about 33 percent blocks in this range of sex ratio. Maldah

is followed by the Uttar Dinajpur with 22 percent concentration of blocks in this range. Remaining two districts records comparatively low concentration of blocks with one block each is having sex ratio between 1001 and 1500 females per 1000 males. Thus, two northern districts, i.e.,

Table 8.5: - Sex Ratio for Marginal Workers in North Bengal, 2001

Classes of Sex Ratio (Number of Females per 1000 Males)	Total Number of C.D. Blocks in each class	Percentage of C.D. Blocks to total C.D. Blocks in North Bengal
1000 and below	6	8.70
1001-1500	19	27.54
1501-2000	14	20.29
2001-2500	17	24.64
2501-3000	8	11.59
3001 and above	5	7.25

Source: - Calculated from PCA, 2001

**Table 8.6: - Sex Ratio for Marginal Workers (based of the region's average),
2001**

	Below Region's Average (<1952)		Above Region's Average (>1952)	
	Number of C.D. Blocks	Percentage of C.D. Blocks in district	Number of C.D. Blocks	Percentage of C.D. Blocks in district
Darjiling	12	100.00	0	0.00
Jalpaiguri	8	66.67	5	33.33
Koch Bihar	3	25.00	9	75.00
Uttar Dinajpur	4	44.44	5	55.55
Dakshin Dinajpur	2	25.00	6	75.00
Maldah	9	60.00	6	40.00
Total	38	55.07	31	44.93

Source: - Calculated from PCA, 2001

Darjiling and Jalpaiguri constitute 56 percent of all blocks registering sex ratio among marginal workers falling between 1001 and 1500 females per 1000 males. However,

total number of blocks in this group is 19 while another 17 blocks of North Bengal registered marginal worker's sex ratio between 2001 and 2500. Thus, in other words, the later mentioned range is the second highest concentration of blocks constituting about 25 percent of all blocks of North Bengal. Among these blocks in this group, Dakshin Dinajpur's share is the largest constituting its 50 percent blocks followed by Maldah with its 40 percent blocks. These two southern districts together constitute about 59 percent blocks of North Bengal recording sex ratio in this range. Next to Maldah, Jalpaiguri and Uttar Dinajpur possess 3rd and 4th highest concentration with 20-35 percent blocks in this range. The small concentration is from Koch Bihar, which contributes only 8 percent of its total blocks having sex ratio of this range.

Another important cluster is the range of 1500-2000 with 20 percent blocks of whole North Bengal recording sex ratio among marginal workers of this group. Maximum concentration is of Jalpaiguri, which is followed by Maldah with 38 percent and 27 percent blocks respectively. Next important cluster is in Uttar Dinajpur where 22 percent blocks show this kind of sex ratio. Remaining three are Dakshin Dinajpur, Koch Bihar and Darjeeling with 13 percentage, 8 percentage and 8 percent respectively.

Next important cluster is the 2501-3000, where about 12 percent blocks of North Bengal fall. In this range, maximum contribution is of Koch Bihar and Dakshin Dinajpur districts where 25 percent blocks each recorded in this range followed by Uttar Dinajpur with 22 percent. Lastly Jalpaiguri records less than only 8 percent blocks in this class.

Next important group are two extremes with 8.70 and 7.25 percent cluster in 1000 and below and 3001 and above group respectively. In the former case, two districts namely, Darjiling and Koch Bihar record about 42 percent and 8 percent blocks. On the other hand, in the 3001 and above group, maximum concentration has recorded by Koch Bihar with 33 percent followed by Uttar Dinajpur with 11 percent blocks. Except these two, no other district has recorded any concentration in the above 3001 sex ratio group.

Based on the region's average (1952 females per 1000 males) sex ratio among marginal workers, the whole North Bengal may be divided into two parts with more blocks in below average group. Table 8.-- shows that about 55 percent blocks of whole North Bengal, records marginal worker's sex ratio of below region's average of 1976 females

per 1000 males while remaining 45 percent blocks are on the other side, i.e., in the above average group, constituting about 45 percent blocks of whole North Bengal. It is interesting to note that, all blocks of Darjiling have sex ratio below average while 60-62 percent blocks of Jalpaiguri and Maldah register their name in this below average group during 2001 census. Rest three blocks record majority of their blocks on the above average side. In this group, Koch Bihar and Dakshin Dinajpur lead by 75 percent of blocks each having more than the region's average marginal worker's sex ratio with Uttar Dinajpur as the third position with 56 percent of its blocks in this group (Table 8.6).

In contrast with the main workers, sex ratio among marginal workers in Darjiling district is high; it is very low in comparing with the marginal worker's sex ratio of other districts of the North Bengal. The block wise maximum in Darjiling is recorded in Kharibari with only 1656 females per 1000 males which is about half of the block wise maximum in whole North Bengal. Kharibari is the only block, where the sex ratio is above 1500. It is followed by Kalimpong – II with 1451 females per 1000 males. Though among main as well as total workers, sex ratio in four southern blocks is very low, yet in case of marginal workers, Kharibari has broken the group and records slightly high sex ratio than the remaining three southern blocks, i.e., matigara, Naxalbari and Phansidewa. Among these three, the first two record sex ratio of very low group with below 1000 females for every 1000 males with Naxalbari as the minimum sex Raito in the district. Along these two the comparatively high main worker's sex ratio recording northeastern blocks of the district, i.e. Jorebunglow- Sukhiapakri, Darjeeling-Pulbazar and Kurseong also form the low sex ratio group among marginal workers with less than 1000 females. Remaining 6 blocks form the transition group between below 1000 and more than 1500 and varies between 1001 and 1500 females per 1000 males.

About 1809 females are engaged as marginal workers in the Jalpaiguri's work force with maximum of 2598 in Mainaguri to minimum of 1185 in Kalchini. Thus, in this district, there is no block recording sex ratio among marginal workers less than 1000. Nearly 32 percent blocks record marginal worker's sex ratio more than 2000. That means in these 32 percent blocks, females are work as marginal workers are nearly double in number than that of the males. Among these, majorities are located in the southern part of the district with only Kumargram in northeast border block. All these blocks have very low

female participation rate in main workers only exception is Kumargram. On the contrary, blocks with very low rate of sex ratio among marginal workers record comparatively high female participation as main workers than other blocks are Kalchini, Nagrakata, Matiali and Madarihat. It is interesting to note that, all of these blocks are located in the northern part of the district and are face the Himalayas in their north. Except Matiali, all three- Kalchini, Nagrakata and Madarihat bordering the Bhutan to their north. These four blocks constitute about 31 percent of the district. Remaining 31 percent blocks are situated on the northwestern corner and middle-southern portion of the district record the number of female marginal workers per 1000 male marginal workers varies between 1501 and 2000 females per 1000 males.

Though Koch Bihar records the minimum sex ratio among main workers in whole North Bengal, it has highest number of female marginal workers in the whole region. About 2615 female marginal workers are there per every 1000 male workers. However, this figure varies from block to block and maximum numbers of female per 1000 males are recorded in the Sitai, where the number of female marginal workers is more than triple than that of males (3494). On the contrary, on the extreme western part of the district, one block is there namely Haldibari, where the number is as low as 774 females per 1000 males. Thus, a large gap is there in the district in terms of women participation in marginal work force. Haldibari is the one block with number of female marginal workers less than number of males. It has brought down the sex ratio for the whole district also. It is mentioned before that about 75 percent blocks of Koch Bihar have recorded marginal workers sex ratio above the regions average. Among the rest of blocks, one that is Cooch Behar – I records sex ratio more than 1500 female workers per 1000 males in marginal activities. However, among the above average group, four blocks record very high sex ratio of more than 3000. These four blocks having female marginal workers three times more than that of the males constitute 33 percent of all blocks of the district. These blocks are located in the southern and southwestern part of the district including Sitai, Dinhata – II, Sitalkuchi and Mathabhanga– I. There are five blocks constituting about 42 percent of the district, where the number of female marginal workers are two times more than that of the male marginal workers (Map 8.5).

Figure 8.6: - District Wise Distribution of Sex Ratio among Marginal Workers in North Bengal, 2001

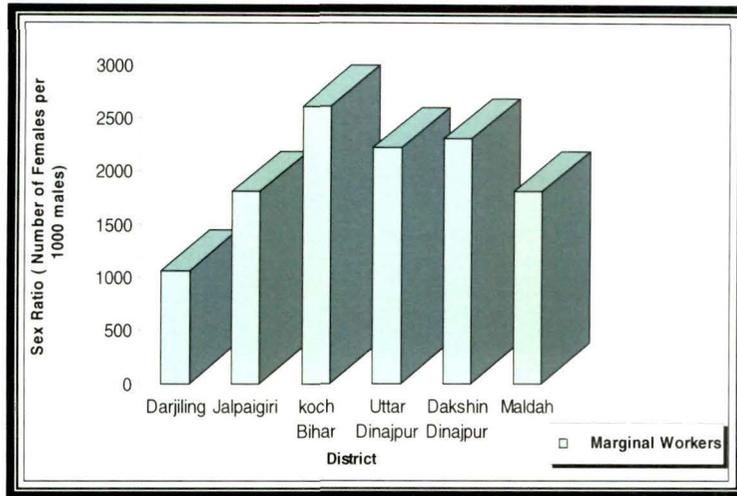
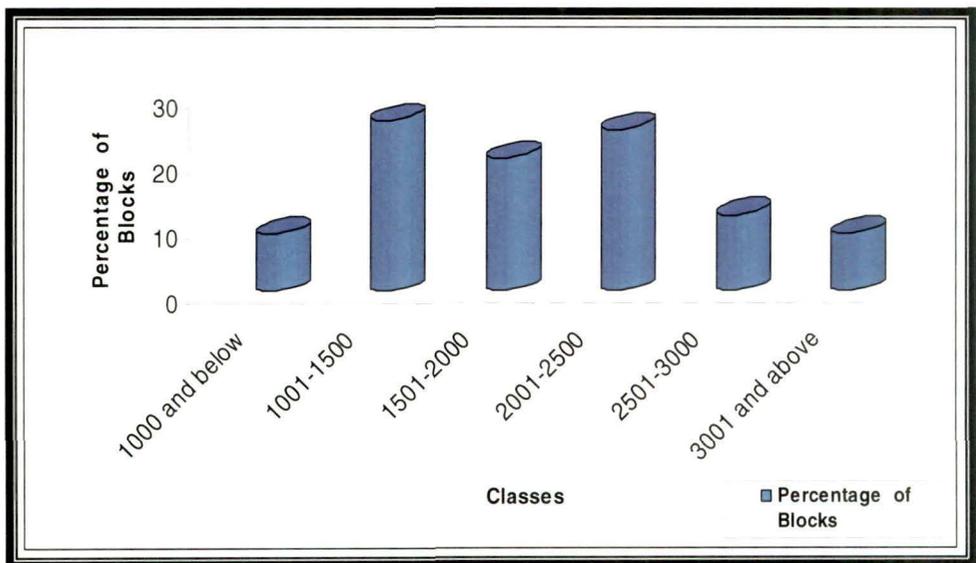


Figure 8.7: - Block Wise Distribution of Sex Ratio among Marginal Workers in North Bengal, 2001



Though in Uttar Dinajpur, the average sex ratio among marginal workers is slightly less than that of the Koch Bihar, but the block wise distribution of sex ratio is much lower than the Koch Bihar. As stated earlier that due to very low sex ratio in only one block, average sex ratio of the Koch Bihar has become low, but in absence of such type of extreme values and as all the blocks with marginal workers sex ratio well above 1000, the average value for the Uttar Dinajpur district has come closer to the Koch Bihar inspite of absence of very high sex ratio like the later. However, there is only one block in Uttar Dinajpur, with sex ratio of more than 3000 and it is the Itahar, the southern block

of the district, only where the number of female marginal workers are three times more than that of the males. An interesting feature in the distribution of marginal workers is that, the sex ratio generally increases from north of the district to south, with minimum in two extreme north blocks Chopra and Islampur, where the number of female marginal workers are below 1500 females per 1000 males. Next share is of middle blocks i.e., Goalpokhar –II and Hemtabad with the average sex ratio of marginal workers various between 1501 and 2000. About 44 percent blocks of Uttar Dinajpur record sex ratio between 2001 and 3000, that is, in these blocks, number of female marginal workers is two times more than that of the males and these blocks are Raiganj, Karandighi, Goalpokhar –I and Kaliaganj.

Though the maximum sex ratio among district's marginal workers has recorded in Koch Behar, yet the second maximum among districts is found in the Dakshin Dinajpur, where 2307 female marginal workers are recorded against every 1000 male marginal workers. The maximum in blocks is found in Kushmundi, which is the one block in Dakshin Dinajpur, with three times more females than males as marginal workers. Kumarganj is the block with the minimum sex ratio among marginal workers where 1267 females are recorded per 1000 male workers and it is followed by Balurghat with 1877 female marginal workers against every 1000 male marginal workers. There are about 75 percent blocks in this district recording marginal workers sex ratio between 2001 and 3000. In this group, Hilli is one of the minimum marginal sex ratio recording blocks, but this extreme southeastern block records highest sex ratio among total workers of the district. Harirampur, Bansihari and Tapan are other blocks in the 2001-3000 groups except Hilli. Two blocks namely Kushmundi and Gangarampur, record sex ratio between 2501 and 3000 females per 1000 males. In this block about 2861 females are working as marginal workers.

The southernmost district of the North Bengal, i.e. Maldah records 1806 female marginal workers for every 1000 male marginal workers. The maximum and minimum values range from Harischandrapur–II with 2390 and English Bazar with 1149 respectively. There are only 40 percent blocks in this district, where the marginal worker's sex ratio is two-times more than the male worker's number. These are eastern and southern blocks with exception of Harishchandrapur-II in the north. This last mentioned block possesses the maximum number of females per 1000 males in marginal work force of the district,

yet it is much below than the block wise maximum in whole North Bengal region. Another southern block, i.e. Kaliachak-I, where the female participation as main workers as well as total workers is extremely high, but in case of marginal workers, the number of female workers is as low as 1546 per 1000 male workers. Including this Kaliachak –I, about 27 percent blocks record marginal worker's sex ratio between 1501 and 2000 and majority of them are located in the northwestern part of the district with one i.e., Kaliachak-I in the south of the district. It is interesting to note that, inspite of the same proportion of females in total population like English Bazar, the female work participation rate (i.e., percentage of female total workers to total female population, 2001) in Kaliachak-I, III and II is far better than the English Bazar, which records its 42 percent people as urban against cent percent rural population in three Kaliachak blocks. It may be due to the concentration of Bidi industry in these three southern blocks of the district.

8.7 DISTRIBUTION OF SEX RATIO AMONG PEOPLE ENGAGED IN VARIOUS AGRICULTURAL AND NON-AGRICULTURAL ACTIVITIES

All the industrial categories can be classified into two- agricultural and non-agricultural activities. Agriculture is directly related to many facts of sustainable development, including poverty eradication, sustainable consumption and production, management of natural resources, energy, freshwater, health, education, trade and market access as well as technology transfer and capacity building. Agriculture is an integral part of the general development system, serving the system as a whole and being served by it. Agriculture centers on integrated use of natural resources such as soil, water, climate and biological diversity. The integration of agriculture with other aspects of land management and ecosystem conservation is essential in order to promote both environmental sustainability and agricultural production. Agricultural activities cover the population engaged as cultivators and agricultural labourers. In the whole country and the state of West Bengal, these activities include maximum number of population. North Bengal region is also following the trend with about 53 percent of its total work force as engaged in various agricultural activities. On the other hand, the non-agricultural activities include workers engaged in various industries and in trade, commerce and other activities. With the increasing trend of urbanization and industrialization, people are more prone towards rural to urban migration to utilize all types of facilities provided by urban life. As a

consequence, this trend results into push factor in agriculture and increasing number of people joining in various non-agricultural activities. Though, more than half of total work force is in various agricultural activities in the whole region, but the female participation rate is low like all other sectors of work. There are only about 329 females per 1000 males in whole state, who are engaged in various agricultural activities and 298 females per 1000 males in non-agricultural activities. But, in North Bengal region, the picture is surprisingly reverse. Here, the sex ratio for non-agricultural activities is more than that of agricultural activities.

Map 8.6: - Distribution of Sex Ratio for Agricultural and Non-Agricultural Workers in North Bengal, 2001

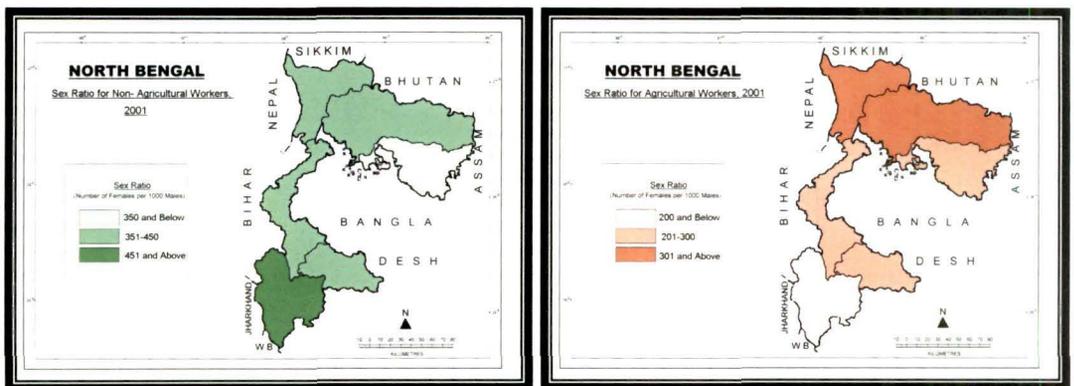


Table 8.7: - Sex Ratio among Agricultural and Non-Agricultural Activities in North Bengal, 2001

	Sex Ratio among Workers engaged in	
	Agricultural Activities	Non-Agricultural Activities
Darjiling	462	368
Jalpaiguri	322	380
Koch Bihar	297	273
Uttar Dinajpur	283	381
Dakshin Dinajpur	251	445
Maldah	173	746
North Bengal	270	442

Source: - Computed from PCA, 2001

As the Table 8.7 indicates, Darjiling records maximum sex ratio in whole region for agricultural workers recording 462 females per 1000 males. It is followed by Jalpaiguri with 322 females per 1000 males. Three districts, namely, Koch Bihar, Uttar Dinajpur and Dakshin Dinajpur have sex ratio among agricultural workers between 250 and 300 females per 1000 males. But in Maldah, the sex ratio is very low with only 173 females per 1000 males, who are engaged in various agricultural activities.

In case of female participation in various non-agricultural activities, Maldah record the highest sex ratio of 746 females per 1000 males. Not only that, it is the only district, where the sex ratio among non-agricultural activities are more than 700 females per 1000 males. It is followed by Dakshin Dinajpur with 445 females per 1000 males. These two southern districts have sex ratio more that the region's average of 442 females per 1000 males. However, remaining four districts have recorded sex ratio for non-agricultural workers below 400 females per 1000 males. Three districts, namely Uttar Dinajpur, Jalpaiguri and Darjiling record the sex ratio for non-agricultural workers between 350-400 females per 1000 males. Only Koch Bihar has recorded sex ratio of below 300 females per 1000 males. It indicates that, more number of female workers are engaged in non-agricultural activities majority of districts of the region. It is supported by the fact that, except Darjiling and Koch Bihar, in all remaining four districts of North Bengal, sex ratio for non-agricultural workers is more than that in case of the agricultural and allied activities (Map 8.6).

8.8 SEX RATIO AMONG DIFFERENT CATEGORIES OF TOTAL WORKERS- DISTRICT LEVEL ANALYSIS

The industrial composition of North Bengal's work force is overwhelmingly dominated by the primary sector. One out of every two workers in this region (53.15 percent) are engaged in agricultural activities like cultivation and as agricultural labourers. Cultivation alone accounted for 25.59 percent of the region's workers, during 2001 census. Agricultural labours contributed 27.56 percent of the region's working force. It is not only establishes the primacy of agriculture in the region's economy, but also exposes the incapability of the secondary sector of the region's economy to create jobs and absorb labours. The number of females in agricultural activities per thousand males is not satisfactory. It is only 262 females and 638 females as cultivators and agricultural

labourers respectively. Comparing with the figures of whole West Bengal, northern six districts of the state combinely support relatively more number of females for every 1000 males in both of these primary activities during 2001 census.

Figure 8.8: - Distribution of Sex Ratio among Agricultural and Non- agricultural Workers in North Bengal, 2001

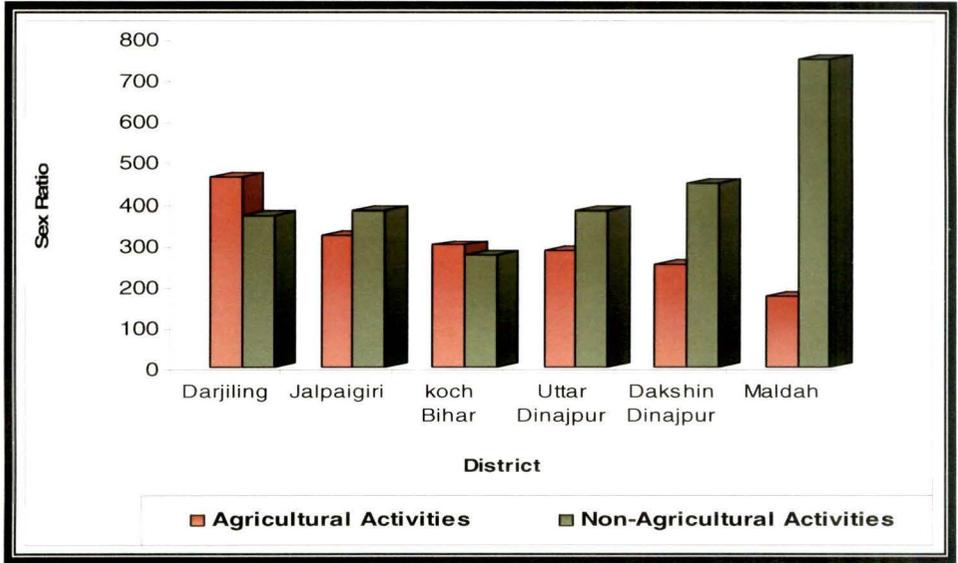
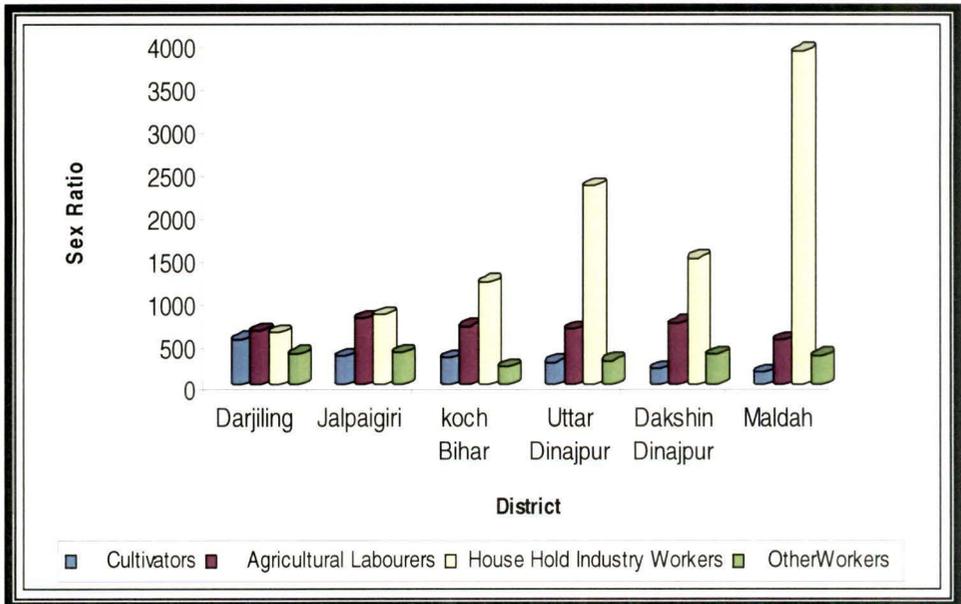


Figure 8.9: - Distribution of Sex Ratio among Various Categories of Workers in North Bengal, 2001



About 201 females are engaged as cultivators per 1000 males in the whole state while the figure for the North Bengal is 262 (Appendix 8.3). The district wise variation ranges from 524 as maximum to 143 as minimum in Darjiling and Maldah respectively. Jalpaiguri and Koch Bihar follow Darjiling with 330 and 305 female cultivators per 1000 male cultivators respectively. In these three northern districts, the number of female cultivators against every 1000 male cultivators is more than 300, while in Uttar Dinajpur, the sex ratio is same as the North Bengal's average of 262. Remaining two southern districts have sex ratio among cultivators of less than 200. Therefore, the ratio decreases from north to south with maximum in extreme north and minimum in extreme south (Appendix 8.5).

Among whole agricultural labourer class of the state, 447 females are there per 1000 males while in case of North Bengal, the number of female has recorded 638 per 1000 males. Thus, in both the regions, the sex ratio is more than that of the cultivators. Among all of six districts of whole North Bengal, Jalpaiguri records maximum sex ratio of 765 and Maldah records minimum sex ratio of 516. Jalpaiguri is followed by Dakshin Dinajpur with 715 females per 1000 males. These two districts have more than 700 females per 1000 males among agricultural labourers, which indicate that there is more female participation in labour force as agricultural labourers instead of cultivators in these two districts. Three districts namely, Koch Bihar, Uttar Dinajpur and Darjiling have sex ratio between 600 and 700 while only Maldah have less than 600 females as agricultural labourers per 1000 males. Darjiling having maximum sex ratio among cultivators record second minimum sex ratio among agricultural labourers. Not only that, Darjiling along with Maldah record the number of female workers per 1000 male workers as agricultural labourers less than the region's average of 638. All of six districts of North Bengal record sex ratio for agricultural labourer more than the state's average.

In both the regions, in the state and the North Bengal region, number of females engaged in household industry is more than that of the males. However, in case of the former, i.e., the whole state, the sex ratio is 1406 while the sex ratio for the North Bengal region is 2295 females per 1000 males. The district wise distribution of sex ratio among household industry workers is maximum in Maldah with 3885 females per 1000 males and minimum in Darjiling with 604 females per 1000 males. Thus, in the former, number of females engaged in household industry is three and half times more than that of the

males. Uttar Dinajpur follows Maldah with female workers engaged in household activities more than double than the male numbers in this sector. Dakshin Dinajpur and Koch Bihar have sex ratio for workers in this sector between 1000 and 2000. But northern two districts, namely Darjiling and Jalpaiguri, record low female workers in household industries as compared to males. Maldah, having very low sex ratio among cultivators and agricultural labourers is the only district having more sex ratio among household industry workers than the region's average (Appendix 8.5).

In the whole state, 214 females per 1000 males are engaged in activities other than cultivators, agricultural labourers and household industry activities. But the figure is 328 in case of the whole North Bengal region. Jalpaiguri records maximum sex ratio with 368 females per 1000 males while Koch Bihar have minimum of 202 females per 1000 males. Koch Bihar along with Uttar Dinajpur records other worker's sex ratio of below 300. Remaining four districts of the region record sex ratio above 300 females per 1000 males. All of these four districts also have sex ratio more than the region's average of 328 females per 1000 males in terms of other workers.

Though Maldah records lowest sex ratio among cultivators and agricultural labourers, but as it records highest sex ratio among household industry workers and third highest in case of other workers, hence the district secure first position in terms of sex ratio for total workers. Thus it is mainly due to the exceptionally high female participation in household industry and its allied activities. It is followed by Uttar Dinajpur due to its high female participation in household industrial activities.

8.9 CULTIVATOR'S SEX RATIO- BLOCK LEVEL VARIATION

The block wise distribution of sex ratio of cultivators varies from maximum of 705 in Jorebunglow-Sukhiapokri to minimum of 19 in Kaliachack- III. Thus, there is a quite wide gap between the highest and the lowest sex ratio of the region. This gap is due to variety in topography in different parts of the region along with variety in climate, soil character, cropping method above all people's various attitudes towards agricultural practices governed by diverse social and cultural setting of different parts of the region.

However, this gap of sex ratio may be classified into some groups like sex ratio of below 100, 101-300, 301-500, 501-700 and more than 701. Table 8.8 shows that, more than

half of total blocks of North Bengal record cultivator's sex ratio between 101 and 300. About 46 percent blocks of the region are in this group. It is followed by next group of 301-500, with about 25 percent of all blocks of the region. Next important cluster is found in the sex ratio group of below 100 with 13 percent blocks and it is followed by the sex ratio class of 501-700 with about 12 percent blocks of the region. The highest sex ratio class of above 701 females per 1000 males record only three blocks. Therefore, about 59 percent blocks of the whole North Bengal record cultivator's sex ratio of below 300, while about 83 percent blocks have sex ratio below 500 females per 1000 males. While the lowest sex ratio class have solely 13 percent blocks, but two highest classes form combinely about 16 percent blocks. However, majority of blocks of the region record very low sex ratio among total cultivators. As the maximum concentration of blocks is found in the range of 101-300, all the districts have contribution in this range of sex ratio. Three southern districts have major contribution of blocks in this range being Dakshin Dinajpur as the highest with about 88 percent blocks in this range. It is followed by Uttar Dinajpur with about 78 percent blocks in this range. Maldah comes next with 60 percent of its blocks. Therefore, these three southern districts constitute about 64 percent blocks recording sex ratio between 101 and 300 in the whole region. Remaining blocks are located in the three northern districts of the region, with Darjiling as the least cluster. Among these three, Koch Bihar's share is the highest.

**Table 8.8: - Sex Ratio for Cultivators in North Bengal-
Block Level Variation, 2001**

Classes of Sex Ratio (Number of Females per 1000 Males)	Total Number of C.D. Blocks in each Class	Percentage of C.D. Blocks to total C.D. Blocks in North Bengal
100 and below	9	13.04
101-300	32	46.38
301-500	17	24.64
501-700	8	11.59
701 and above	3	4.35
Total	69	100.00

Source: - Calculated from PCA, 2001

Next important agglomeration of blocks is found in the class of 301-500. In this class, about 19 percent blocks of the whole North Bengal record their names. Though it is the second most important cluster of blocks, but no block of Maldah and Dakshin Dinajpur

is in this group. Remaining four districts have share of blocks in this class. In this group, Jalpaiguri's share is the largest with 54 percent blocks, which is followed by Koch Bihar. About 33 percent blocks register sex ratio for cultivators in this class. Remaining two districts contribute one block each in this group. Next important group is that, which form the minimum sex ratio and this class record about 14 percent blocks. Maldah record maximum cluster of block in this class having about 40 percent blocks in this group. It is followed by Koch Bihar with 17 percent blocks. The northern district, i.e., Darjiling, has recorded minimum concentration of blocks in this range. Two highest groups form next important cluster of blocks. In the highest group of sex ratio, only Darjiling has recorded with one block in this group.

The concentration of blocks in different sex ratio group reveals that, in Darjiling, about half of its blocks have recorded sex ratio ranging between 501 and 700. There is only one block of this district recording more than 700 females per 1000 males in cultivator class. This block is one of having this kind of sex ratio in the whole region and this is the northwestern block of the district namely, Jorebunglow-Sukhiapokri. Though, this block record second lowest sex ratio in the district for marginal workers, but it records maximum number of females per 1000 males as main workers and as total workers. In spite of uneven and rugged topography, the northern block of the district record cultivator's sex ratio more than 500 females per 1000 males. All five northern blocks bordering Sikkim to the north and Nepal to the west and Bhutan to the east have comparatively more female cultivators than that of southern four blocks. A middle block, namely, Kurseong is also records sex ratio of 501 group, while all of four blocks in the south instead of existence of low-lying foothill plain land possesses very low number of female workers as cultivators ranging below 300 females per 1000 male. Jalpaiguri, which is the second most important sex ratio recording district among cultivators, varies between maximum of 501 to minimum of 182 in its blocks in Kumargram and Dhupguri respectively. However, Kumargram is the only block, where the sex ratio has recorded above 500. About 54 percent blocks of the district record sex ratio between 301 and 500. All western blocks of the district bordering Darjiling to the north and northwest, Bangladesh on the southwest and Koch Bihar on the south lie in this group of sex ratio along with Alipurduar-I. Thus, remaining 38 percent blocks of the district record less than 300 females per 1000 males in their working class as cultivators. In the Koch Bihar district, though the average sex ratio for all blocks is recorded 295 females per 1000

males, but in individual block, it varies from 45 to 506 in Haldibari and Mathabhanga-I respectively. The last one along with four other blocks covering about 42 percent of the district, which support more than 300 female cultivators for every 1000 male cultivators. It is interesting to note that, in Sitalkuchi, Sitai and Dinhata-II, about more than three times more females are engaged as marginal workers than that of males, but these blocks record only one-third female workers than males as cultivators. There are two blocks, namely, Haldibari and Tufanganj-I, where the number of female cultivators per 1000 male cultivators is as low as below 100 females. In rest of the blocks, accounting 42 percent of the district, the sex ratio has recorded between 101 and 300 and these blocks are Cooch Behar-I, Mathabhanga-II, Mekliganj, Dinhata-I and Tufanganj-II and among them, the first mentioned block has the lowest sex ratio while the last one has maximum. The block wise distribution of cultivator's sex ratio varies between maximum of 502 in Goalpokhar-I to minimum of 102 in Chopra with an average of 253 females per 1000 males in the whole district. About 78 percent blocks of the district record sex ratio less than 300 females per 1000 males. Except Itahar, all the northern and southern blocks are in this group. Another exception is the centrally located Goalpokhar-I, where more than 500 female cultivators are there against 1000 male cultivators. Out of total 8 blocks, about 88 percent record sex ratio for cultivators between 101 and 300 in the Dakshin Dinajpur district. Only Kumarganj has recorded sex ratio of less than 100 females per 1000 males. In this district, though the female participation is comparatively high as marginal as well as total workers, but as cultivators it is very low. As mentioned earlier, the sex ratio among cultivator's decreases from north to the southern portion of the region, Maldah records the lowest district wise sex ratio of only 132 females per 1000 males. No one block is there with sex ratio more than 300. Not only that, there are quite a large number of blocks with sex ratio among cultivators well below 100 females per 1000 males. All the three southern blocks of the district record negligible sex ratio for cultivators and it is as low as below 40. With totally alluvial plain land fed by river Ganga and its numerous tributaries and cent percent rural population, it is quite surprising in these blocks to have such a negligible proportion of females as cultivators because these Muslim dominated blocks possess high proportion of unskilled females. Along with these blocks, English Bazar, Harishchandrapur-I and Ratua-I also record less than 100 females per 1000 males as cultivators. Remaining 60 percent blocks of the district covering whole eastern, western and central part of the district, record cultivator's

sex ratio between 101 and 300. Habibpur records the lowest sex ratio for cultivators in the district. Having about 17 percent of total area of the region and with about 22 percent of total North Bengal's population, Maldah records a very low female participation rate as cultivators with only 02 percent of its total female population as cultivators. This is perhaps due to high female workers absorption capacity of various household industries in the district. On the other hand, due to the absence of any such opportunity to work in industrial sector along with existence of undulating and inaccessible mountainous areas Darjiling district records only 4 percent of its total female population engaged as cultivators.

Figure 8.10: - Block Level Distribution of Sex Ratio among Cultivators in North Bengal, 2001

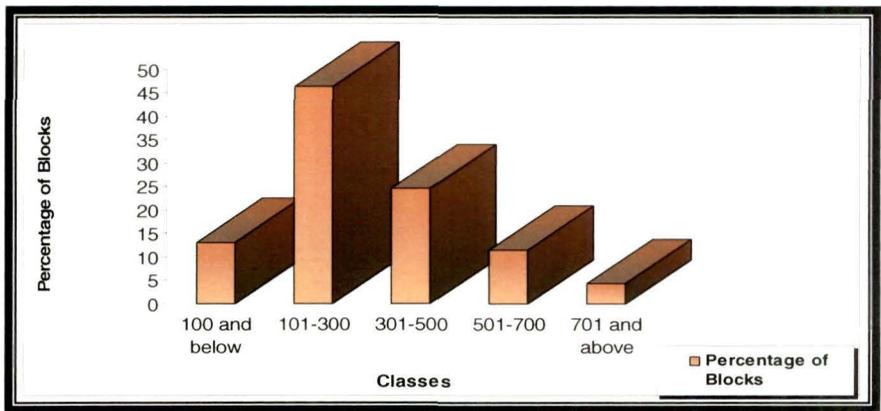
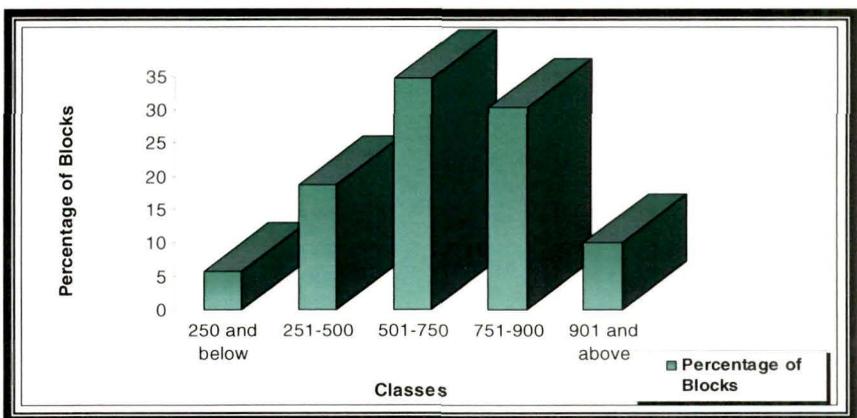
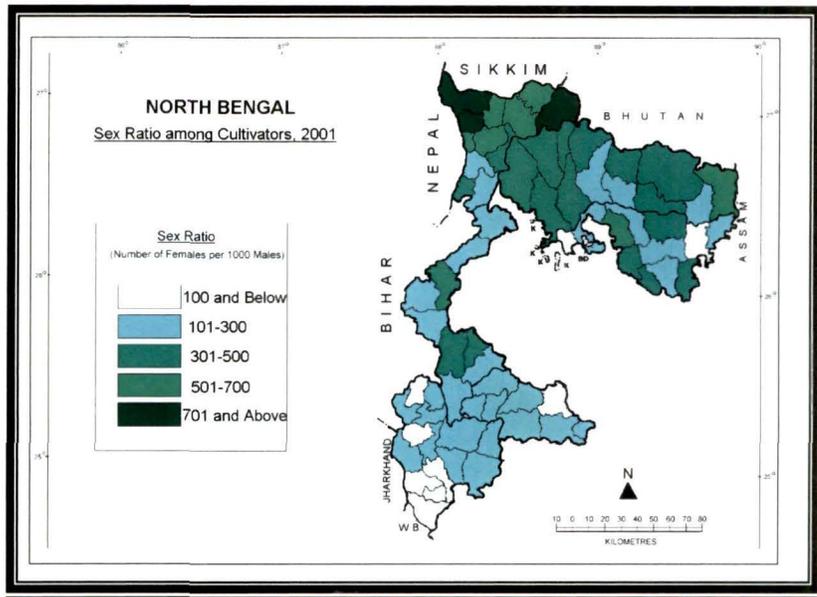


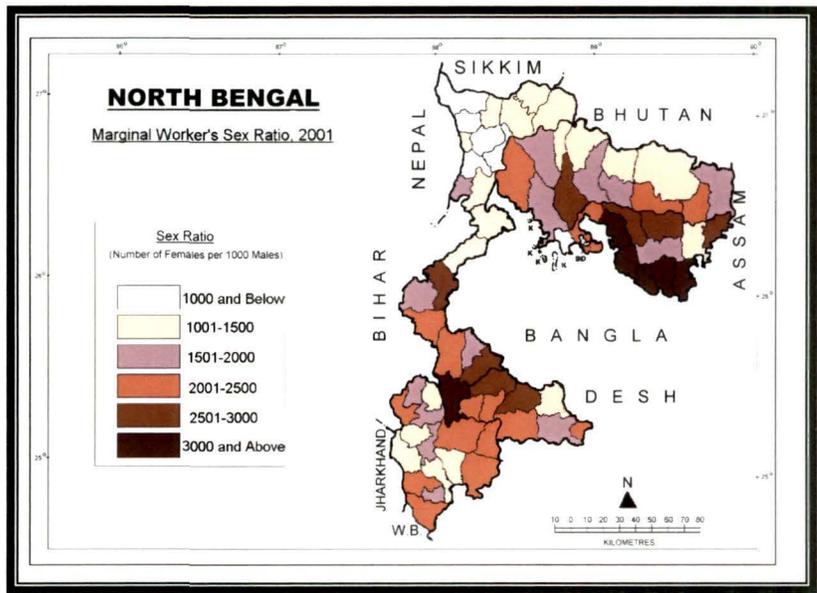
Figure 8.11: - Block Level Distribution of Sex Ratio among Agricultural Workers in North Bengal, 2001



Map 8.7: - Sex Ratio among Cultivators, 2001



Map 8.8: - Sex Ratio among Agricultural Labourers, 2001



Another interesting feature regarding the sex ratio among total cultivators in North Bengal is that, majority of blocks record sex ratio below the region's average of 248 females per 1000 males. About 55 percent blocks have recorded sex ratio in this group while remaining about 45 percent are on the above average side. Blocks situated in the northern three districts have more concentration in the above average group of sex ratio.

Among them, Jalpaiguri shows largest concentration of blocks in this range with 77 percent of its blocks showing sex ratio of cultivators more than the region's average. Remaining two northern blocks share about 67 percent each in the above average group. In case of the southern three blocks of the region, the concentration of blocks in the above average group is minimum in Maldah, where only 7 percent blocks are in this group followed by Dakshin Dinajpur with the concentration of only 13 percent blocks in this group. Uttar Dinajpur leads in the southern section of the region with the cluster of about 33 percent blocks of the district falling in the above average group (Map 8.7).

8.10 SEX RATIO FOR AGRICULTURAL LABOURERS- BLOCK LEVEL VARIATION

Female participation in work force as agricultural labourers is far more than that of the cultivators. About 447 females work as the agricultural labours in the whole West Bengal per 1000 males. The figure is about 639 for the whole North Bengal region. Table 8.9 reveals the block wise distribution of sex ratio for agricultural labourers. Jalpaiguri with 770 females per 1000 males leads all districts. Dakshin Dinajpur follows it with a sex ratio of 719. Three districts namely, Koch Bihar, Uttar Dinajpur and Darjiling follow in terms of sex ratio among agricultural labourers. The southernmost district, like that of the cultivators record lowest sex ratio among agricultural labourers, with only 515 females per 1000 males.

Block wise distribution of sex ratio varies from maximum of 1189 in Habibpur to minimum of 25 in Kaliachak-I; both of them are located in Maldah. Thus, there is a wide gap between these two extreme figures. All of five blocks except Maldah record sex ratio for agricultural labourers above the region's average, and block wise data reveals that, about 61 percent blocks of the region have sex ratio in the above average group (Table 8.9).

About 92 percent blocks of Jalpaiguri have sex ratio more than the region's average, which is followed by Dakshin Dinajpur with concentration of about 75 percent blocks in this range. Except Maldah, all the remaining three districts show concentration of more than 55 percent blocks in the above region's average group. Only Maldah have recorded below region's average sex ratio for agricultural labourers in its 73 percent blocks.

Table 8.9: - Sex Ratio for Agricultural Labourers in North Bengal- Block Level Variation, 2001

Classes of Sex Ratio (Number of Females per 1000 Males)	Total Number of C.D. Blocks in each Class	Percentage of C.D. Blocks to total C.D. Blocks in North Bengal
250 and below	4	5.80
251-500	13	18.84
501-750	24	34.78
751-900	21	30.43
901 and above	7	10.14

Source: - Calculated from PCA, 2001

However, to analyze the sex ratio of agricultural labourers of all blocks of North Bengal, it is necessary to classify the wide gap of maximum and minimum sex ratio into several classes, like 250 and below, 251-500, 501-750, 751-900 and 901 and above.

Table 8.9 shows that, maximum concentration of blocks is in the class of 501-750, where about 35 percent blocks of whole region register their sex ratio among agricultural labourers. These blocks cover some portions of all districts of the region. However, maximum concentration of blocks is found in Darjiling district with about half of its blocks recording sex ratio of this range. Next important cluster of blocks is located in the Jalpaiguri district and about 46 percent blocks of this district have sex ratio among agricultural labourers in this group. About 33-38 percent blocks of Dakshin Dinajpur and Koch Bihar record sex ratio of this type, while about 20-22 percent blocks of Uttar Dinajpur and Maldah have sex ratio in this range. Thus, northern three districts of the region, in combination, accounted for about 67 percent of all blocks recording agricultural labourer's sex ratio between 500 and 750. Next important group in terms of concentration of blocks is in the range of 751-900, which accounted for about 30 percent of all blocks of the whole region. Among these blocks, Koch Bihar and Dakshin Dinajpur's share is the maximum with almost half of their blocks. About 46 percent blocks of Jalpaiguri district records sex ratio for agricultural labourers of this type. Darjiling follows Jalpaiguri, with sex ratio of this type in its about one-fourth blocks.

Remaining two southern blocks record this type of sex ratio in less than 15 percent blocks. Next important class of sex ratio is 251-500, where about 19 percent blocks of whole region record their sex ratio regarding agricultural labourers. Among these blocks, 44 and 33 percent comes from Uttar Dinajpur and Maldah respectively being the highest and the second highest concentration. Darjiling comes next with 17 percent of its blocks in this range. With sex ratio between 251 and 500 in their less than 15 percent blocks, Dakshin Dinajpur and Koch Bihar are in the lowest part. No block of Jalpaiguri records sex ratio among agricultural labourers in this group. About 10 percent blocks of the whole region record sex ratio for agricultural labourers of above 901 range. About 22 and 20 percent blocks of Uttar Dinajpur and Maldah respectively record sex ratio of this type. Only one block each of Darjiling and Jalpaiguri record sex ratio of above 901 females per 1000 males. On the contrary, about 20 percent blocks of Maldah have sex ratio less than 250 females per 1000 males followed by Koch Bihar with 8 percent of its blocks.

About 616 females work as agricultural labourers per 1000 males in Darjiling district and the sex ratio varies within the district from maximum of 972 in Kalimpong-II to minimum of 366 in Phansidewa. Two southern blocks namely, Naxalbari and Phansidewa record sex ratio less than 500 females per 1000 males. About 50 percent blocks record sex ratio more than 500 and less than 750. Two other southern blocks are in this group. Only Mirik have sex ratio between 600 and 700, while three namely Rangli-Rangliot, Matigara and Kurseong have sex ratio below 600 and more than 500 females per 1000 males. About 33 percent blocks of the district record sex ratio more than 751 females per 1000 males. Three northern blocks, i.e., Kalimpong-I, Jorebunglow-Sukhiapokri and Darjeeling-Pulbazar record sex ratio for agricultural labourers more than 751 but below 900, while one block namely, Kalimpong-II have recorded sex ratio more than 901 females per 1000 males.

Jalpaiguri records the district wise maximum sex ratio for agricultural labourers with 770 females per 1000 males in whole North Bengal region. The block wise distribution varies from highest of 970 in Kumargram to lowest of 581 in Matiali. Matiali is the only block in the whole district with sex ratio below 600 females per 1000 males, while in the 600-700 group, three blocks record and these are Dhupguri, Nagrakata and Falakata. Therefore, about 31 percent blocks of the district record agricultural labourer's sex ratio

of less than 700. About 62 percent blocks of the district record sex ratio between 701 and 900. Only Kumargram, the northeast corner block of the district have sex ratio in the above 901 group.

About 682 females per 1000 males are engaged as agricultural labourers in the district of Koch Bihar with block wise maximum as 880 in Mathabhanga-II and minimum as 208 in Haldibari. There is no block with sex ratio more than 900 and only Haldibari record sex ratio below 250 females per 1000 males. There are total six blocks in the district recording sex ratio more than 751 and about 42 percent record sex ratio more than 800 females per 1000 males.

About 640 females are there against every 1000 males in the Uttar Dinajpur district. Itahar records maximum sex ratio in the district with 1014 females per 1000 males and Minimum is recorded in Chopra with 310 females per 1000 males. Thus, sex ratio increases from north to south. Chopra along with Islampur and Goalpokhar-II form the group of sex ratio of below 400 females per 1000 males, while only Karandighi records sex ratio between 400 and 500 females per 1000 males. Goalpokhar-I and Hemtabad have sex ratio between 600 and 700, while Raiganj, Kaliaganj and Itahar record sex ratio for agricultural labourers of above 800. Itahar records more female workers than that of males as agricultural labourers.

In Dakshin Dinajpur district, the block wise sex ratio varies between 719 as maximum and 861 as minimum in Balurghat and Kumarganj respectively. The last mentioned is one with sex ratio less than 500 females per 1000 males. It is followed by Gamgarampur, Kushumundi and Harirampur with sex ratio between 600 and 700.

About 38 percent blocks of this district record sex ratio more than 800. About 515 females are there per 1000 males in Maldah district in the work force engaged as agricultural labourers. The sex ratio varies between 25 and 1189 in Kaliachak-I and Habibpur respectively. Three southernmost blocks, namely Kaliachak-I, III and II, form the range of below 250 females per 1000 males. About 27 percent blocks record sex ratio above 300 and below 400, while only one, i.e., Ratua-I record sex ratio between 400 and 500 females per 1000 males. Four blocks record sex ratio between 501 and 900 females per 1000 males. In the above 901 group, three blocks are there, namely, Gazole,

Bamongola and Habibpur, while the last two record more female agricultural labourers than males (Map 8.8).

8.11 BLOCK WISE DISTRIBUTION OF SEX RATIO AMONG HOUSEHOLD INDUSTRY WORKERS

Though the region's average sex ratio for household industry workers are recorded as about 2295 females per 1000 males, but the blockwise variation ranges from maximum of 6824 in Kaliachak-I to minimum of 322 females per 1000 males in Kharibari. The former is recorded abnormally high sex ratio in workers engaged in various household activities with more than 6000 females per 1000 males. However, there are three blocks in whole region constituting about 4 percent of the whole region have sex ratio of more than 4000 females per 1000 males. These are Kaliachak-I, Karandighi and Goalpokhar-I. There are four blocks namely Kaliachak-III, Kaliachak-II, Chanchal-II and Ratua-II, where the sex ratio ranges between 3001 and 4000 females per 1000 males.

About 13 percent blocks of the whole region recorded sex ratio between 2001 and 3000 females per 1000 males, while about 32 percent record sex ratio between 1001 and 2000 females per 1000 males. Though the blockwise maximum is recorded as more than 6000 females per 1000 males; but about 45 percent blocks of the region record sex ratio less than 1000 with five blocks having sex ratio for household industrial workers of less than 500 females per 1000 males. These five blocks are Kharibari, Kurseong, Naxalbari, Mathabhanga-II and Kalchini. Therefore, majority of blocks of the region record comparatively low sex ratio. But as some blocks record abnormally high sex ratio, hence the average sex ratio of the region has become comparatively high.

In Darjiling district, only Gorubathan records sex ratio for household industry workers more than 1000 and remaining about 92 percent blocks have recorded sex ratio less than 1000 females per 1000 males.

About 23 percent blocks of Jalpaiguri district have sex ratio more than 1000 and these are Alipurduar-II, Alipurduar-I and Mainaguri. While remaining 77 percent blocks record sex ratio of less than 1000 females per 1000 males.

**Table 8.10: - Sex Ratio for Household Industry Workers in North Bengal-
Block Level Variation, 2001**

Classes of Sex Ratio (Number of Females per 1000 Males)	Total Number of C.D. Blocks in each Class	Percentage of C.D. Blocks to total C.D. Blocks in North Bengal
1000 and below	31	44.93
1001-2000	22	31.88
2001-3000	9	13.04
3001-4000	4	5.80
4001 and above	3	4.35
Total	69	100.00

Source: - Calculated from PCA, 2001

In Koch Bihar district, highest sex ratio for household industrial workers is recorded in Dinhat-II, where about 2665 females are engaged per 1000 male workers in these activities and this is the only block in the district with sex ratio more than 2000 females per 1000 males. Out of remaining eleven blocks of the district, six record sex ratio between 1001 and 2000 females per 1000 males, while remaining five blocks record sex ratio of less than 500 females per 1000 males.

In Uttar Dinajpur district, Karandighi and Goalpokhar-I record sex ratio for household industry workers of more than 4000 females per 1000 males, while Chopra and Islampur record sex ratio of less than 1000 females per 1000 males. And remaining 44 percent blocks have recorded sex ratio for household industry workers between 1001 and 2000 females per 1000 males. There is no block in Uttar Dinajpur district with sex ratio between 2001 and 4000 females per 1000 males.

In the Dakshin Dinajpur district, Tapan is the only block with sex ratio for household industrial workers less than 1000. Three blocks namely, Hilli, Harirampur and Kushmundi record sex ratio of more than 2000 females per 1000 males and remaining 50 percent blocks have recorded sex ratio between 1001 and 2000 females per 1000 males.

In Maldah district, as mentioned earlier, one block namely Kaliachak-I records sex ratio for household industrial workers of more than 6000 females per 1000 males which is only one of its kind in whole North Bengal region. However, there are four blocks,

where sex ratio ranges from 3001 to 4000 females per 1000 males. Thus, there is no block with sex ratio more than 4001 but less than 6000 females per 1000 males. Only Bamongola and Harishchandrapur-I have recorded sex ratio of less than 1000 females per 1000 males. Remaining about 53 percent blocks have sex ratio ranges between 1001 and 3000 females per 1000 males.

Thus, in majority blocks in Maldah district, the sex ratio for household industrial workers is high while in Darjiling and Jalpaiguri, majority of blocks record very low sex ratio for household industry workers. More than 70 percent blocks of the whole region record sex ratio less than the region's average of 2295 females per 1000 males.

8.12 BLOCK WISE DISTRIBUTION OF SEX RATIO AMONG OTHER WORKERS

The workers engaged in activities other than agricultural and household industrial activities, record sex ratio of about 328 females per 1000 males in whole North Bengal region. It varies among all of 69 blocks from the highest in Kalimpong-II with 1856 females per 1000 males to the lowest in Kaliachak-I with 1533 females per 1000 males. It is interesting to note that, there is no block in three southern districts, namely, Uttar Dinajpur, Dakshin Dinajpur and Maldah record sex ratio for other workers of more than 1800 females per 1000 males.

**Table 8.11: - Sex Ratio for Other Workers in North Bengal, 2001-
Block Level Variation, 2001**

Classes of Sex Ratio (Number of Females per 1000 Males)	Total Number of C.D. Blocks in each Class	Percentage of C.D. Blocks to total C.D. Blocks in North Bengal
1600 and below	6	8.70
1601-1700	21	30.43
1701-1800	32	46.38
1801 and above	10	14.49
Total	69	100.00

Source: - Calculated from PCA, 2001

The Table 8.11 shows that, about 9 percent blocks record sex ratio for other workers of less than 1600 females per 1000 males. It is followed by the concentration of about 10 percent blocks in the sex ratio group of above 1801 females per 1000 males. However, two major concentrations of blocks are recorded in the 1701-1800 and 1601-1700 sex ratio groups with the concentration of about 46 percent and 30 percent blocks respectively.

8.13 CONCLUSION

It is obvious that, the productive capacity of any region depends on the size of its labour force as well as on the proportion of the persons in the labour force to the total population. The sex and age structure of the labour force, the skills, the experience, the aptitudes, the education and the health of the workers are also considered to be the primary determinants of the productivity of the labour force. For improved productivity and economic growth, the occupational structure of the labour force, its distribution among various industrial sectors and its rural- urban and regional distribution within a region are all important factors to be taken into consideration.

Therefore, employment is the most natural and best way to achieve the objectives of economic growth, poverty eradication, social justice, social stability and peace. To have gainful and creative work is the basic need and an imperative for all human beings. The participation of women in economic activities is an important factor in the economic and social empowerment of women. It is because; employment is not only a source of economic independence, but also gives women a sense of self worth. Women's participation in labour force exposes them to the world outside the home and kinship and helps in developing support systems other than kinship based ones. The women work participation rate analysis reveals the fact that, the gender composition of the labour force displays a systematic change through long term economic development. Besides the economic development, industrialization and demographic factors, cultural and ideological factors play a role in determining the degree of feminization of the labour force.

The distribution of labour force in the North Bengal as a whole, in its all districts and in majority of blocks, the female work participation rate is very low. In the whole region, there are about 24 percent of female workers against about 54 percent of male workers. The sex ratio for main work force is also comparatively low. It is surprisingly below 350 females per 1000 males for main workers in all the districts of North Bengal and except Darjiling, the main workers sex ratio is below 300 females per 1000 males in all remaining five districts. On the contrary, in case of marginal workers, the sex ratio is more than 1000 in all of six districts. And in three districts including Koch Bihar, Uttar

and Dakshin Dinajpur, the sex ratio for marginal workers is recorded as more than 2000 females per 1000 males.

Hence, it may be easily concluded that, the participation of women is more in marginal activities than that in various main economic activities. Generally, the poor village women farmers and nearly landless women have responded to economic contraction and food insecurity by increasing the time they devote to farming marginal lands and to low-productivity informal sector activities. The main reason behind this may be the poverty and social structure of the region. Women in the most places of the study region, like all developing countries, devote significantly more time than men to a combination of work for income and home maintenance, food preparation and childcare. Thus after fulfilling all household needs women, do involve themselves only in some agricultural activities mainly during the economic crisis of the family and during the peak-harvesting season in agriculture to reduce the rate of extra expense paying to other labour in these peak time. Hence, the importance of women earnings in low-income households depends on their proportional representation in household budgets, their role in promoting child nutritional status and their importance in periods of economic crisis.