CHAPTER VI

SOCIO-ECONOMIC FUNCTIONS AND THEIR GAPS IN THE TOWN

INTRODUCTION

The socio-economic scenario of Jalpaiguri town reveals that the socio-economic & other infrastructural facilities are not sufficient to the present demand and further development. So, it is essential to determine the functional and spatial gaps in the town to formulate future planning for balance development.

6.1 METHODOLOGY

The regration equations (Yc=a + bx) has been done for each function and with the help of these equations expected functional scores (E) have been calculated in respect to observed scores (O). The difference between observed(O) and expected(E) values represent the functional gaps in each ward. To determine the level of functional gaps in the ward, these values (O-E) have been grouped in to broad categories like low, moderate, high in both positive and negative values. These functional groups are also useful for selecting future functions in appropriate places of desire level. The scattered diagram of each function shows the relationship, which is either positive or negative.

It is found that high positive relationship exist in the case of literacy, job opportunities in tertiary sectors etc, where as primary and secondary sectors and other functions revel poor relationships.

Like the other towns the level of functions grow with the demand of it's residents, but the number of functions and their level fluctuate from ward to ward. This is because, the relationship between the utilization capacity of the residents of each ward and the demand of several amenities are neglected in this unplanned town. The uneven distribution and haphazard growth of functions create spatial and functional gaps in the town. Due to un-availability of data, it is not possible to represent the level of some functions mathematically.

6.2 FUNCTIONAL GAP

6.2.1 Functional Gap In Literacy

Table-6.1 RELATIONSHIP BETWEEN POPULATION AND LITERACY

Category	No of Literates	Wards (+)	No of Wards	Wards (-)	No of Wards
Low	<100	15,17,18,20,21	5	3,16,23	3
Moderate	100 - 300	6,8,13,14	4	5, 7,25	3
High	300 - 600	10,11,19,24	4	4,9,22	3
Very High	>600	1,2	2	12	1
Total In %			60%		40%

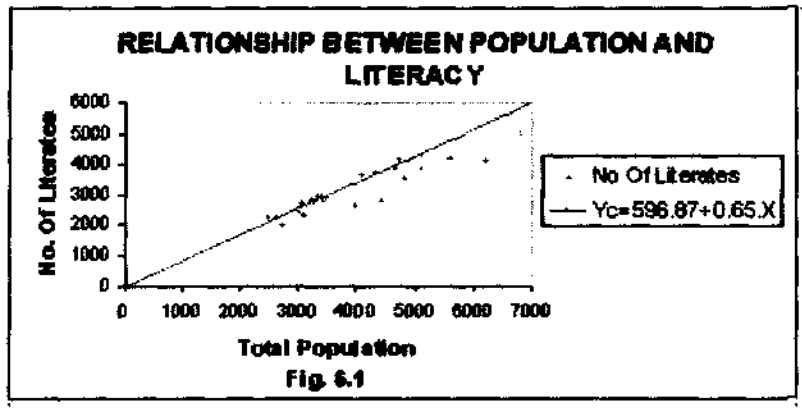


Fig. 6.1

The diagram (Fig-6.1) shows a good positive relationship between the population and total literates in the town. The statistical analysis and diagram reveal that, out of 25 wards 40% have less number of literates than expected and 60% wards have more literates than the expected. Negative relationship reveals that the situation is not good in C.B.D.(ward-no 4,5,7) and peripheral wards(wards no-9,22,23&25) those are shared by only 37% of the total educational institutions. Lack of awareness about education among the slum people resided in these wards and poor economic condition of the people are the reasons of low literacy. The number of literates is negatively very high in ward no12, which consists of the major slum area (harijan basti) of the town. So, the situation is worst in this ward.

The existing number of literates is much high than required in central and southern part, where most people are economically capable to send their children to school. This trend may be the cause of an increase in number of literates mainly in primary level.

6.2.2. Functional Gap In Education

6.2.2.i *Functional Gap In Educational Institution*

For the identification of functional gap in educational institutions score has been applied to represent the level of institutions from primary to college levels. About 32% (8 out of 25) wards are of very low level and 24% (6 out of 25) are of low level are scattered over the central, north-western and southern part those are residential in nature. Among the wards 5 have all types of institutions from primary to college level, where educational facility is very high and these wards are scatteredly situated in north-eastern, south-eastern, and north-western fringe of the town and near C.B.D. The region of high educational facility is concentrated in two neighbouring wards (ward no18 and 24), which is shared by 8% of the total wards.

Table-6.2 FUNCTIONAL GAP IN EDUCATIONAL INSTITUTION

Category	Educational Score	Wards	No of Wards	% of wards
Very Low	<5	4,10,13,15,16,19,22,23,	8	32
Low	5 – 10	2,7,11,17,20,25	6	24
Moderate	10 – 15	3,6,12,14,24	5	20
High	15 – 20	18,	1	4
Very High	>20	1,5,8,9,21	5	20
			25	100

6.2.2.ii *Functional Gap Between Students And Teacher*

The scattered diagram shows poor positive relationship between students and teachers (Fig-6.2). The statistical analysis and the diagram depict that, the condition is equilibrium in wards like 8,22,23,25,which is shared by 16% of the total wards, as the existing number of teachers is equal to the required number in these wards. It is found that, out of 25wards, 9 (36%) have less number of teachers and 12 (48%) wards have more number of teachers than required. The wards having negative condition are located at the fringe area, and in a part of C.B.D. of the town. As the density of population is high in C.B.D. area, the number of students is also high in respect of teachers. The peripheral wards have less number of secondary and higher secondary schools, so more teachers are needed. A better situation is found in the wards, that are dominated by residential population. The number of teachers is positively high in three (3) wards (ward no3, 11, &17) which is due to the passive effect of drop out of students at different levels. The level of educational facility is highest in ward no 8, which has highest number of institutions (8),

students (4073) and teachers(123) among others. It can be said that the better situation is found in those wards. It also indicates the better quality of institutions, as the pressure of students on a teacher is less.

Table-6.3 RELATIONSHIP BETWEEN STUDENTS AND TEACHER

Category	No of Teachers (O-E)	Wards (+)	No of Wards	Wards (-)	No of Wards
Low	1-4	4,6,10,12,15,20,	6	1,2,9,13,21	5
Moderate	4-8	7,14,16	3	5,18,19	3
High	>8	3,11,17	3	24	1
			12		9

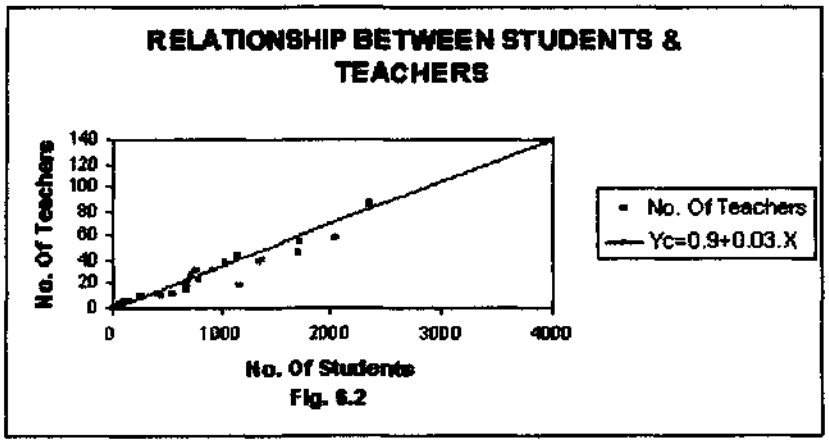


Fig. 6.2

6.2.3. Functional Gap In Job Opportunity

The scattered diagram shows that the relationship is very good and positive (Fig-6.3). The statistical analysis depict that out of 25wards 15(60%)have less number of total workers and 10(40%)wards have more number of workers than expected. The situation is not good in southern and western parts of the town, which are mainly residential in nature. A very view number of people are found to be workers in these wards, because of limited job opportunities. No of existing workers is negatively high in Pilkhana (ward no-9), NewKhata Lane(ward no-10) located at the south-eastern fringe of the town, which is nearly rural in nature. As purchasing capacity of the residents is low, any type of business can not flourished here, so the situation becomes worst. 2Workers are positively high in ward no 1 and 2, where most are engaged in agricultural activities, business or works as marginal workers and in ward no 12, where slum people are engaged in both formal and informal sectors.

Table 6.4 FUNCTIONAL GAP BETWEEN POPULATION AND WORKERS

Category	Workers (O-E)	Wards (+)	No of wards	Wards (-)	No of Wards
Very Low	<50	6,7,25	3	3,8,13,14,15,16,21,24	8
Low	50 - 100	19,22	2	11,18,20	3
Moderate	100 - 150	5,7	2	4,23	2
High	>150	1,2,12	3	9,10	2
			10		15

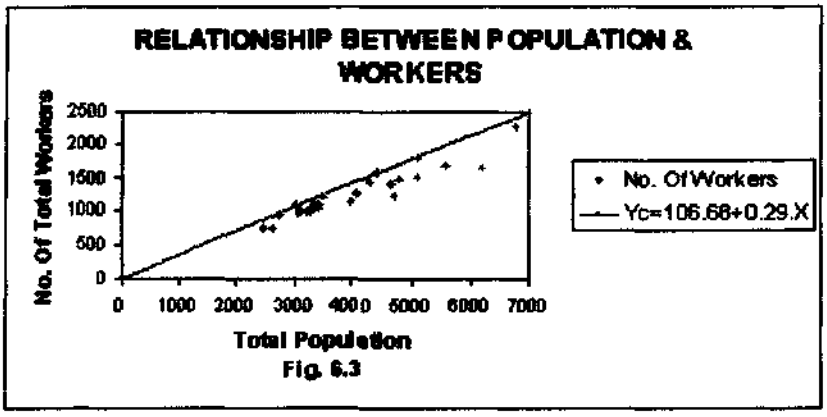


Fig. 6.3

Table-6.5 FUNCTIONAL GAP BETWEEN LITERATES AND MAIN WORKERS

Category	Workers (O-E)	Wards (+)	No of Wards	Wards (-)	No of Wards
Low	<100	17,25	2	6,8,9,13,14,15,19,20,21	9
Moderate	100 - 200	1,3,4,5,7,22	6	11,16,18,23,24	5
High	>200	2,12	2	10	1
			10		15

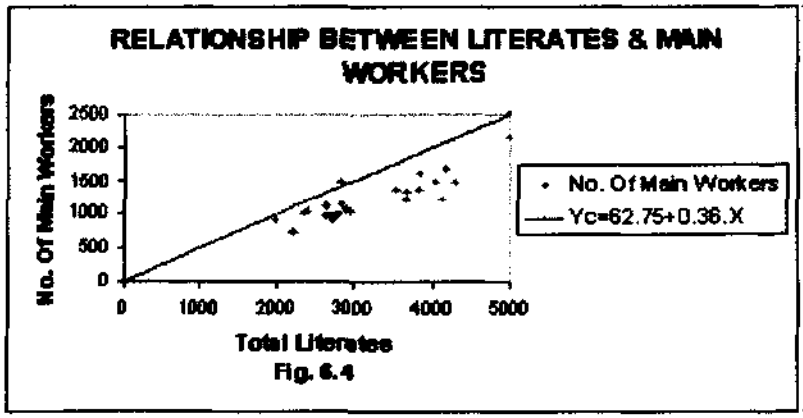


Fig. 6.4

Fig-6.4 shows a good positive relationship between literates and workers. Table 6.5 shows that out of 25wards 15(60%) have less number of workers in respect of literate persons. But a better situation is found in 10wards(40% of the total). The wards having less number of main workers are mainly residential wards. In these wards family size is small and most of the families have one or two earning members. It is also found that, females are mostly housewives and depended population is also large in number, so beside having more literates the number of main workers become less. The number of workers is negatively high in ward no 10(Race course, Asram Para etc.), which is situated at the south-eastern part of the town. In this ward, family size is large but most of the people are unemployed.

A better situation is found in C.B.D. area and at the northern fringe of the town. Due to the concentration of workers in and around C.B.D. and large number of earning members (>than2) in each family of the peripheral wards are responsible for the better situation. Compared to the total workers less number of literates are living in fringe area which is the other reason for this. The workers are positively high in ward on 2&12, where major slums (Bhatakhana, Harijan basti) are situated with numbers of formal and informal workers.

Table-6.6 FUNCTIONAL GAP BETWEEN TOTAL WORKERS AND PRIMARY WORKERS

Category	Primary Workers (O-E)	Wards (+)	No of Wards	Wards (-)	No of wards
Low	<5	2,11,13,15,18,22,23	7	4,6,7,8,9,12,24,25	8
Moderate	5 - 10	16,19	2	3,10,14	3
High	>10	1,20	2	-	-
			11		11

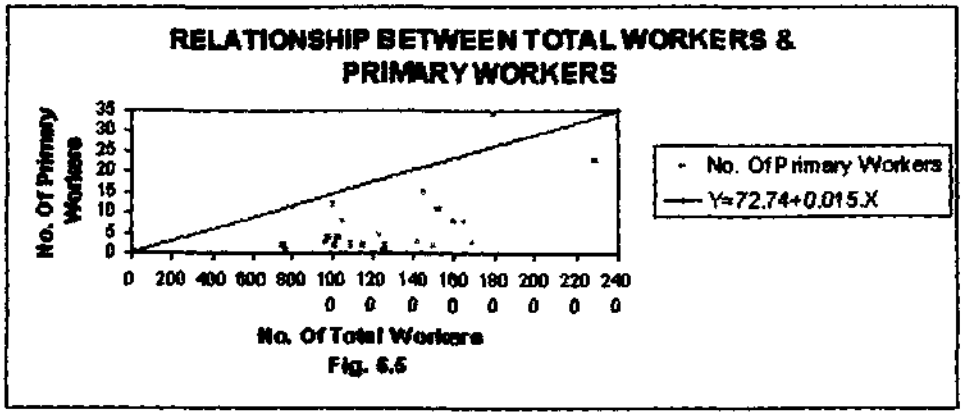
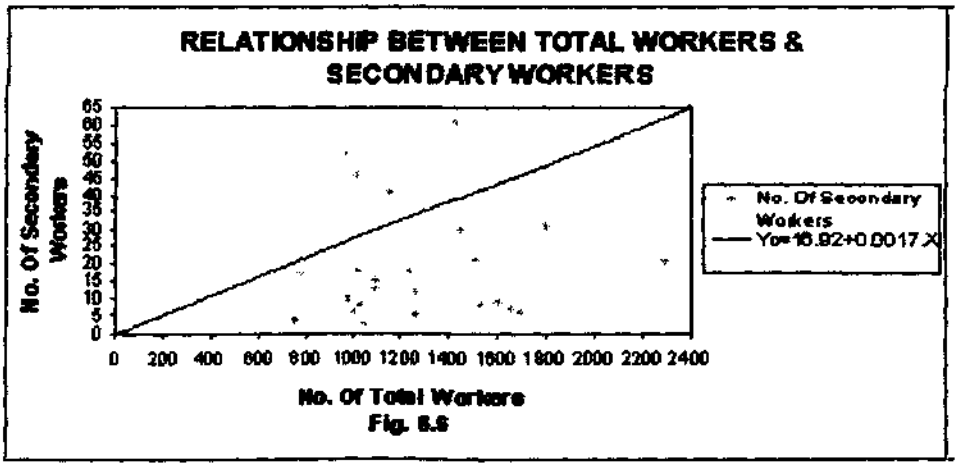


Fig. 6.5

The scattered diagram does not revel and clear relationship between workers and primary workers(Fig-6.5). There is no variation in 12% wards (ward no5,7, and 21) which shows the equilibrium condition as the existing and required number of primary workers are equal. In jalpaiguri town the number of primary workers (958) is very low, and mainly found in fringe area. Table-6.6 shows that, primary workers are positively or negatively exist in the wards, *those are identical in number (11), and each of them is shared by 44% of the total wards of the* town. It is very natural to find less number of primary workers in commercial area (ward no 4,6,&7) and in some wards where most of the workers are engaged in secondary or tertiary activities. Primary workers are more in number in the fringe area where some agricultural lands are still exist.

Table-6.7 FUNCTIONAL GAP BETWEEN TOTAL WORKERS AND SECONDARY WORKERS

Category	Secondary Workers (O-E)	Wards (+)	No of Wards	Wards (-)	No of Wards
Low	<10	2,25	2	5,6,8,15,17,23,24	7
Moderate	10 - 15	1,19	2	3,9,10,11,12,13,18,20	8
High	>15	4,14,21,22	4	16	1
			8		16



The diagram does not revel any clear relationship between workers and secondary workers (Fig-6.6). It is found that the condition is equilibrium in only one ward (ward no7), where small-scale industries are predominant. Out of 25wards 16(64% of the total) have less number of secondary workers than required and 8wards (32%) have more number of secondary workers than

expected. The negative gap is found due to concentration of business, trade and other tertiary activities in and around C.B.D. and due to the absence of manufacturing or household industries in some residential areas of the town. The gap is negatively high in Mahamaya Para (ward no16), which is purely residential with out having any smallscale industry or manufacturing activities. To the contrary, the situation is better in the wards, those have some small scale industries i.e. wooden or metallic furniture, foodstuff or cane industry etc.

Table-6.8 FUNCTIONAL GAP BETWEEN TOTAL WORKERS AND TERTIARY WORKERS

Category	Tertiary Workers	Wards (+)	No of Wards	Wards (-)	No of Wards
Low	<25	5,6,12,20	4	4,14,21	3
Moderate	25 - 50	2,7,8,10,13,15,24	7	9,17,19,22,23,25	6
High	>50	3,11	2	1,16	2
			13		11

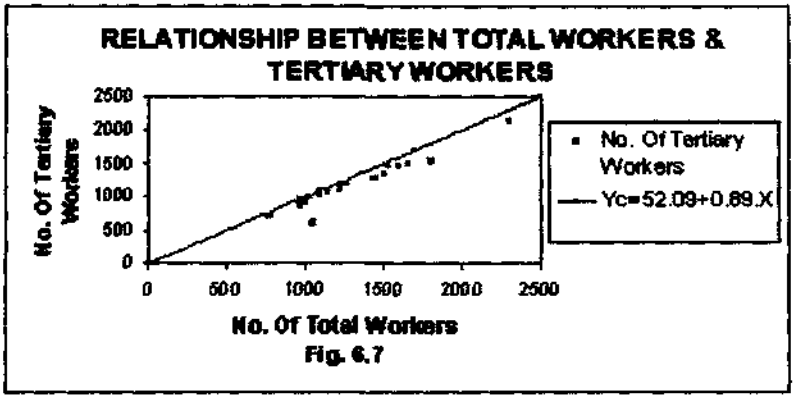


Fig. 6.7

The scattered diagram shows a very good positive relation between the total workers and tertiary workers of the town (Fig-6.7). The statistical analysis depict that, the condition is equilibrium in only one ward (ward no18). Considering the tertiary workers in respect of total workers 44%(11out of 25) wards shows less number of tertiary workers than required and 52%(13 out of 25) wards shows better situation. The functional gap is found in the wards, those are purely residential and lack of business facilities. In ward no 1 tertiary workers are negatively high, because primary activities are dominant here.

The situation is positive mainly in central business area and in some part of residential areas where schools, public, semi-public offices are situated. To

minimize the travel cost most people those are engaged in tertiary sector like to stay in these area. Tertiary workers are positively high in ward no3, where administrative zone is located and in ward no11, in which most workers are involved in small-scale business.

6.2.4 Functional Gap In Communication

About 15 post offices are scatteredly located in the town. Among this only Head Post Office (ward no 8) have all type of communication facilities i.e. ordinary postal service, speed-post, telephone, telegram facilities etc. About 66% post offices (10 out of 15) have speed-post facility. So, higher order service like speed-post, telegram system should be introduced in other post office near C.B.D.

6.3 SPATIAL GAP

6.3.1 Spatial Gap In Education

Educational institutions of all level are unevenly situated among the wards. Each and every ward has primary schools but, the number of school is insufficient as the population per primary school is very high. The situation is worst in ward no 9 (3093 persons/primary school), which is located at the south-eastern fringe area, and followed by ward no15 (3103 persons/primary school), ward no 22(2753 persons/primary school) and others. So, more primary schools are required in ward no 9,10,15,22 & 23 for the easy accessibility for children. The situation is very poor in case of Jr. High school. There are only three (3) Jr. High school, among these two are located closely (ward no 2&3) at the eastern side of River Karala. The rest one is situated in almost opposite direction leaving a big gap between them.

The location of secondary schools are quite unscientific as four (4) out of seven (7) schools are located in two adjacent wards and remaining 18 wards have no secondary school. So, more secondary schools are needed in north- eastern part (ward no 1,2,3) southeastern part (ward no 9,10,11) and western part (ward no22,23) of the town. Population per secondary school is low (1143persons/secondary school) in ward no16 and high (4648persons/secondary school) in ward no14.

The spatial gap in higher secondary schools is also very prominent. There is a tendency to concentrate in neighbouring wards leaving gaps between the other wards. A wide gap is

found in the western part of the municipality, where more higher order schools are to be established. The school situated in ward no 3 served the highest no of people (5578 persons/higher secondary school). The lowest number of people (1716 persons/higher secondary) served by the school situated in ward no 8, as two schools (both Boys & Girls) are situated here. So, it can be said that the condition is good in this ward.

6.3.2. Spatial Gap In Health Care Facility

Jalpaiguri town has only one (1) hospital, situated in ward no 1. To determine the trend of population served by hospital, five concentric circles has been drawn at a interval of 1 km, which reveal the number of population getting medical facility with the increase of each km distance from the Sadar Hospital. It is found that, from Zone I to Zone IV population increasing with per km. increase of distance from Sadar Hospital, which indicate the facility is less accessible to the people living away from the hospital (Fig-6.8). After Zone IV there is a decreasing trend of population with increase of each km, which is natural. But most of the people (>than50%) of the town have to cover 3 or 4 km. distance to get medicare. So, it can be said that, the hospital is not scientifically located in the town. To minimize this gap more health services are to be installed in southern and western part of the town.

6.3.3. Spatial Gap In Trade And Commerce

The major commercial activitie of the town is carried out through Dinbazar, which is located in the C.B.D. of the town (ward no4). The five density- zone around C.B.D. (Fig-6.10) represent the accessibility of market facility per km. in Jalpaiguri town. The diagram (Fig-6.10 & 6.11) reveals that, from Zone I to Zone IV the density of population gradually decreases with the increase of each km. distance from C.B.D, which is quite natural. People like to stay in and around the C.B.D. to get the better availability and easy accessibility of market. But after Zone IV the density increased in Zone V, which is an exception. This is due to the fact that, Zone V occupying the peripheral wards, those are larger in area and population than other wards. Five daily retail markets of the town are situated at north (ward no 25), mid-eastern (ward no8) southern (ward no 13) and central part (ward no 4 & 17) of the town. Population of 20% wards(5 out of 25) are well facilitated compared to others due to the nearness and easy accessibility of market place.

POPULATION ZONES AROUND SADAR HOSPITAL

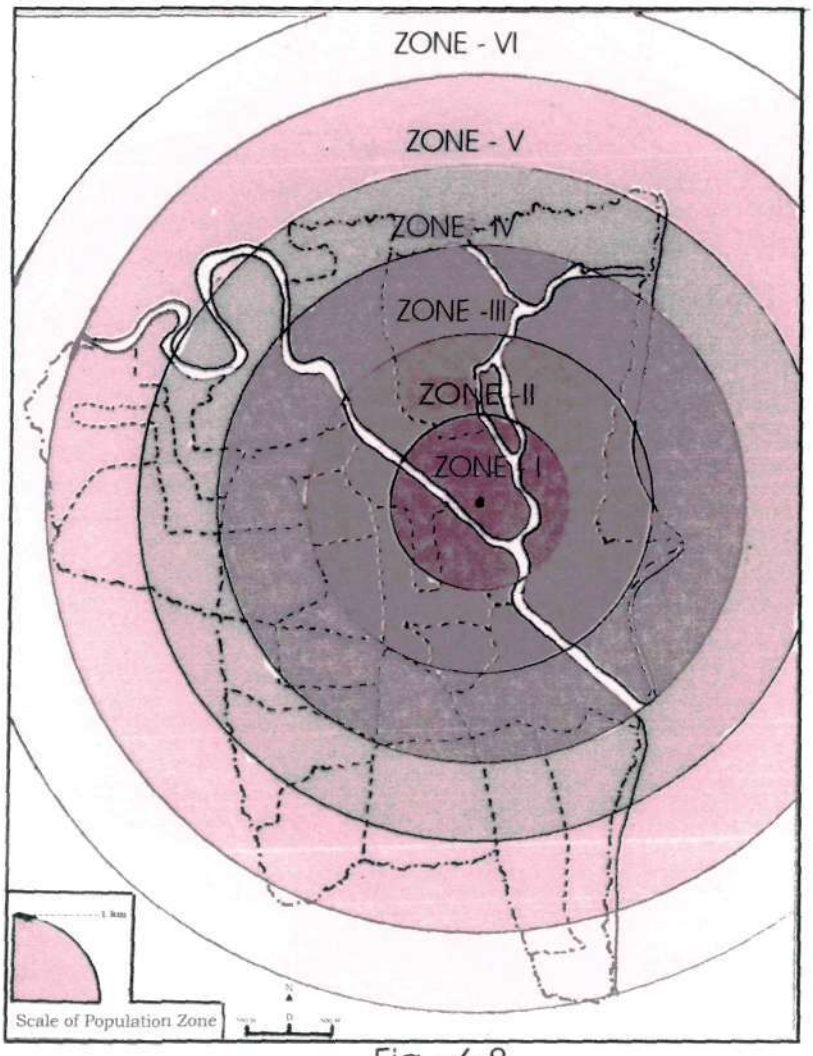


Fig - 6.8

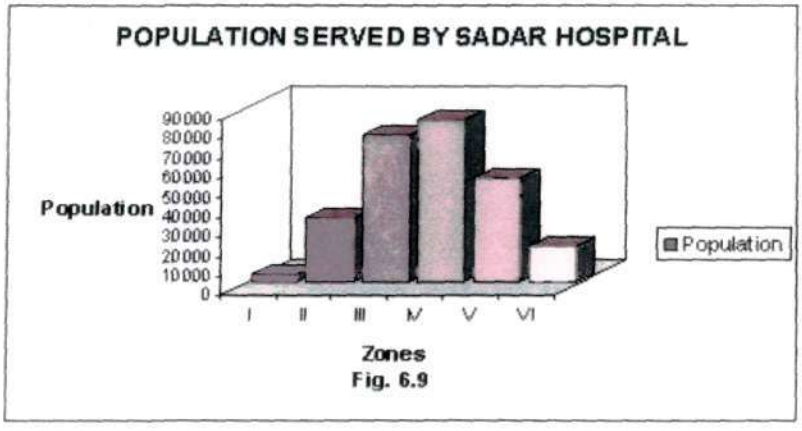


Fig. 6.9

DENSITY ZONES AROUND C.B.D

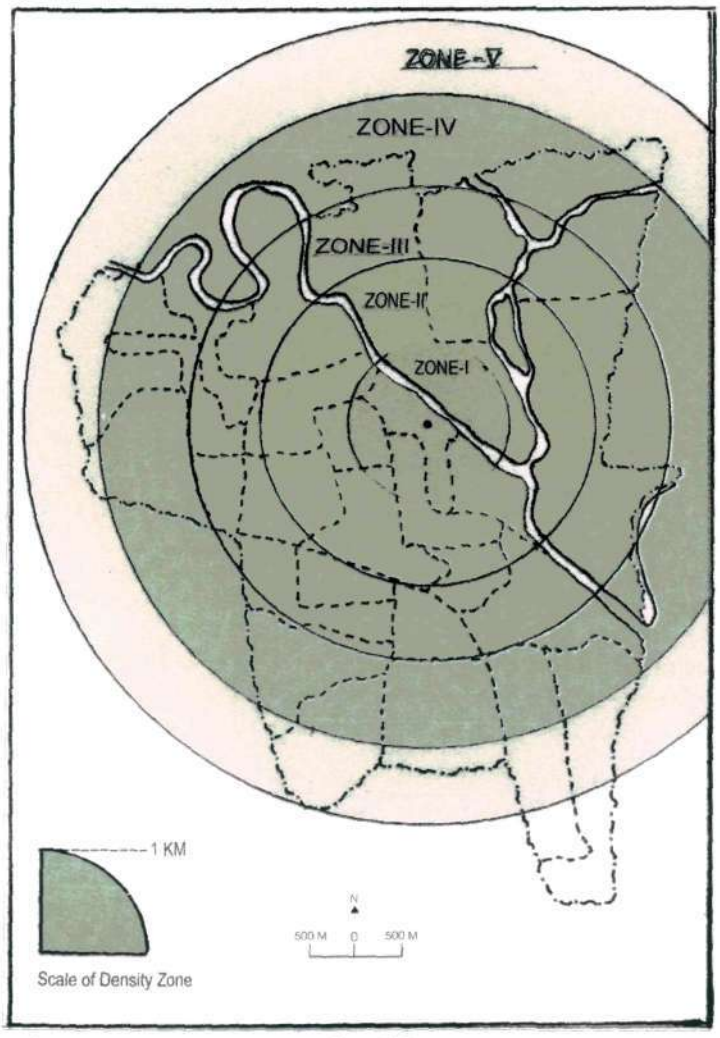


Fig - 6.10

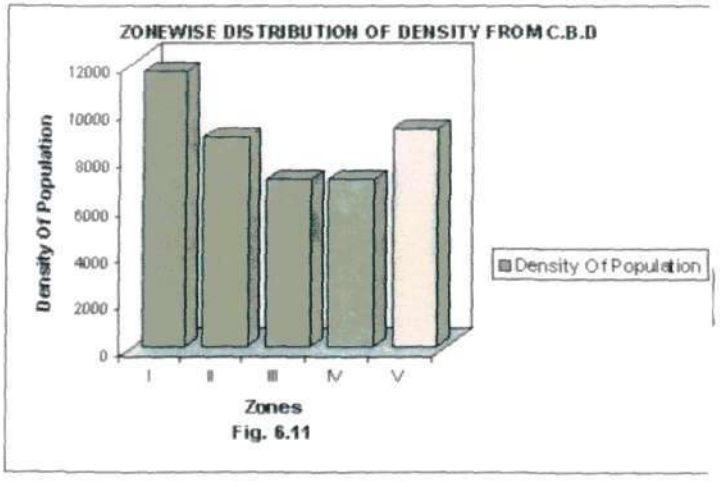


Fig. 6.11

6.3.4. Spatial Gap In Communication

About 15 post offices are unevenly located in the town. Table 6.9 shows that the command population per post office is highest (>8000 persons/post office) in three wards (ward no 9,13 & 17). The command population per post office is high in ward no 15 as the pressure of population is high in this ward. The command population per post office is low to very low in north eastern, eastern part and in C.B.D. as more than one post office are located to serve the residents.

Table-6.9 COMMAND POPULATION WITH NUMBER OF POST OFFICE

Command Pop/P.O	No of Post Office	% of Post Office
<5000	4	27
5000 - 6000	4	27
6000 - 7000	3	20
7000 - 8000	1	6
>8000	3	20
Total	15	100

6.3.5. Spatial Gap In Water Supply

The over all water supply is satisfactory in Jalpaiguri town. But the zone wise variation of water stand post /1000 population for public use can be observed (Table-6.10).

Table-6.10 ZONE WISE WATER STAND POST /1000 POPULATION

Category	Stand Post /1000 Population	Zone
Low	<5.5	I(north-eastern), II(eastern)
Moderate	5.5 - 6.5	V(southern)
High	>6.5	III(central),IV(north-western)

Water stand post/1000 population is low (< than 5.5 stand post/1000pop) in north-eastern and southern part of the town, and high(>6.5 stand post/1000pop) in central and north-western part. So, more number of stand posts are required in Raikat Para, Walkarganj, Sen Para (north-eastern) and Pilkhana, Race-course, New-Khata Lane (south-eastern) area.

CONCLUSION

From the over all study it is visualized that, some of the wards have poor infrastructural facilities in the case of some amenities. The existing functions are haphazardly distributed among the wards. Literates are high in respect of total population in central and southern part of the town. A large number of educational institutions, economic capability of the people and efficient means of communication are the reasons for high concentration of literates in the residential areas like Mahanta Para, Ananda Para, Ukil Para, Deshbandhu Para etc. It is found that primary schools are scatteredly situated through out the town, but both secondary and higher secondary schools are concentrate in selected areas leaving wide gaps in western and north-eastern part of the town. Due to the inadequacy of secondary and high secondary schools in the town the tendency to drop out by the students is noticed in higher order schools. The functional gap between institutions should be filled up by setting up new schools at desire level or to convert lower order schools to higher order. Except Hospital Para and Hakim Para the entire eastern part of River Karala is neglected than the western part. So, it can be said that the existing educational facility is inadequate in eastern part of River Karala. The infrastructural facility of educational institutions is better in some of the secondary and higher secondary schools and colleges, and rests are lacking in required no of teachers and other facilities. To minimize the spatial gap between schools, a number of primary and secondary schools are to be initiated in Pilkhana, walkarganj, Rajbari Para etc. area and at least 3 Junior High school should be established in Bamun Para, Arabindra Nagar, Netaji Para area to serve at least 1k.m.around it.

It is very natural to found more number of workers in the main business center of the town (ward no 5,6,7,19) and in the slums where adults and children both work for earning bread. The wards having less number of main workers are mainly residential wards, where housewives and depended population are large in number Beside having a positive relation between literates and main workers, the town suffers from adequate job opportunities in all sectors. It can be said that, with the increase of literacy, cultural and economic development primary workers are decreasing day by day and only found in fringe area, where some agricultural lands are still exist. Secondary workers are not predominant in the town as small-

scale industries are very few in number. Tertiary workers are mostly found in central business area and in some part of residential areas.

In the town Sadar Hospital is situated unscientifically and inadequate for such a larger population of the town. The average distance between two markets is 2 km. and the entire wesrem part, north-eastem part have no daily markets. So, to minimize the travel distance between the existing markets at least 4 daily markets have to be established in Walkarganj (ward no2), Sen Para (ward no3), Pilkhana (ward no9), New town Para (ward no20) for easy accessibility and quick service. Existing markets should be developed.

Post offices are unevenly located in the town. To meet the need of the people and for easy accessibility new post offices should be initiated in Bose Para or arabindra Nagar and Bhatakhana area. It is also found that water supply is sufficient in the town, but more number of public water stand posts are to be installed in Walkarganj, Pilkhana area.

From the over all discussion it is found that, in Jalpaiguri town all wards have educational facility. About 48% wards of the town have both educational and postal facility, are located in north-eastern part, (Rajbari Para,Sen Para) C.B.D. area, (Dinbazar, D.B.C. road)), middle part (Mahanta para,Ananda Para), south-wesrem part (W.Congress Para,Bawbazar) of the town. As these wards are poor in functions, higher order functions are to be needed. About 24% wards have educational, postal and financial institutions, those are mostly concentrate near C.B.D. Out of 25wards only 5(20% of the total) wards have all type of facilities,and are scatterdly situated in C.B.D(ward no 5), mid-eastern part(ward no8), central part(ward no 170 of the town. As the demand is high in and around C.B.D, it is natural that the number of functions and their level is also high in these areas. It can be concluded that to develop the town, the spatial and functional gaps have to be filled up by setting up new functions in the appropriate place among the wards as well as in the town.