

CHAPTER - IIIOCCUPATIONAL STRUCTURE OF BIRBMUM DISTRICT

The occupational structure plays a dominant role to the economic base studies of any region to understand economic potentials and position. Before going into micro-level study it may be well said in a broad outline about the occupation structure of the area where 74% of the total workers is supported by agriculture. One feature that is clearly brought out from the trend of population growth in the district upto 1961 is that the population increase seems to have varied directly with the state of agriculture. For instance, in Labpur and Nanoor Police Stations nearly six persons in any group of ten workers are engaged as cultivators. In Murarai Police Station every alternate worker is a cultivator. Md. Bazar, Illambazar, and Nalhati are the other Police Stations, where proportion of cultivators to total workers is above the district average.

The Census of 1981 divides the general population of the area into two broad categories workers and men-workers of which the former comprises the following nine livelihood classes :

(1) Cultivators, ii) Agricultural labourers, iii) Mining quarrying, forestry, fishing, hunting, iv) Household industry, vi) Construction, vii) Trade and Commerce, viii) Transport and Communication, and x) Other services.

The pattern of general distribution is far from being uniform from region to region. The population has grown at a larger place in the Southern and the Eastern tracts of the District than the western side; Bolpur and Sainthia Police Stations have registered the maximum growth rate. Pressure on the soil is least in the western police station. It decreases towards the west on the borders of the Santhal Parganas where the surface is barren and undulating.

AREA AND POPULATION POLICE STATION, 1981

<u>Police Station</u>	<u>Area</u>	<u>Population</u>
Murarai	356.9	208,843
Nalhati	359.5	209,832
Rampurhat	472.4	258,869
Mayureswar	381.0	187,227
Rajnagar	221.2	54,139
Muhammad Bazar	313.4	92,853
Khayrasole	273.5	100,817
Dubrajpur	359.5	134,191
Suri	292.9	156,576
Illambazar	259.5	99,064
Sainthia	311.1	153,399
Bolpur	333.6	166,435
Labpur	271.2	130,132
Nanoor	309.2	142,952
DISTRICT TOTAL :	4545.0	2,095,892

Population of six Towns in 1981

<u>Name of Town</u>	<u>Status of town</u>	<u>Area (sq.km.)</u>	<u>Population</u>
Bolpur	Municipality	13.13	35,436
Dubrajpur	Municipality	7.51	20,381
Nalhati	Non-Municipality	6.66	
Rampurhat	Municipality	5. 10	34,593
Sainthia	Non-Municipality	3.37	24,081
Suri	Municipality	9.48	40,783
		45.25	1,58,279

Rampurhat Police station is the most popular one, followed order by Nalhati, Murarai, Mayureshwar and Bolpur. Among the six towns of the district, Bolpur is the most popular town followed by Suri and Rampurhat.

Pattern of Rural Population

According to 1981 Census, 1,9,22,296 people live in villages and the remaining 173,533 live in urban areas. There are 2,234 inhabited villages in the district and the average population per village is 602.

Rural population may be divided into the following categories according to 1981 Census.

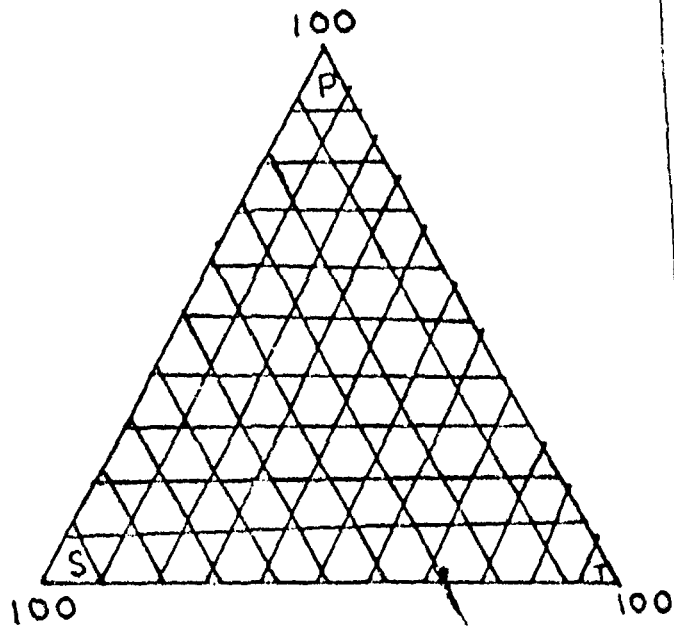
<u>Profession</u>	<u>No. of people</u>	<u>Percentage of Total</u>
1. Cultivators	1,75,257	37.03
2. Agricultural labourer	2,00,002	42.26
3. Livestock, Forestry, Fishing, Plantation and allied activities	4,323	0.92
4. Mining and Quarrying	1,570	0.33
5. Household Industry	11,908	2.52
6. Other than Household Industry	12,937	2.74
7. Construction	1,753	0.38
8. Trade and Commerce	16,315	3.44
9. Transport and Communication	6,925	1.46
10. Other Services	42,241	8.92
	<u>4,73,231</u>	<u>100.00</u>

The pattern of rural population shows that 68.7 per cent of the total in the rank came from cultivators ; next agricultural labourers.

Density of Population :

In the District, 830 persons on an average occupy are square mile of area. The roral areas of the district have an average density of 780, while the urban density comes to 5,768 to a square mile.

TERNARY DIAGRAM



P - PRIMARY ACTIVITIES
S - SECONDARY ACTIVITIES
T - TERTIARY ACTIVITIES

From the broader point of view occupational classes can be classified into three basic categories - primary, secondary and tertiary. The table shows the basic classificatory occupational groups and their percentages. This table gives us the broad occupational structure of the area.

Police Station	Primary Employment	%	Secondary Employment	%	Tertiary Employment	%
Murarai	36750	78.68	2972	6.36	6983	14.96
Nalhati	37216	85.32	1654	3.79	4749	10.89
Rampurhat	43669	76.25	4403	7.69	9201	16.07
Mayureshwar	37499	89.29	1274	3.03	3225	7.69
Mahammad Bazar	19997	86.00	1170	5.03	2185	8.97
Rajnagore	10974	84.37	150	1.18	1979	14.45
Khayrasole	19086	78.81	2516	10.89	2613	10.79
Dubrajpur	24092	75.34	2641	8.26	5243	16.40
Suri	22225	64.65	2647	7.70	9508	<u>27.66</u>
Illambazar	20690	89.03	846	3.61	1899	8.10
Sainthia	26226	75.70	2487	7.18	5930	17.12
Bolpur	29030	75.83	2349	6.13	6907	18.04
Labpur	95100	98.56	983	1.14	257	0.30
Nanoor	27034	95.33	1043	3.68	267	0.94

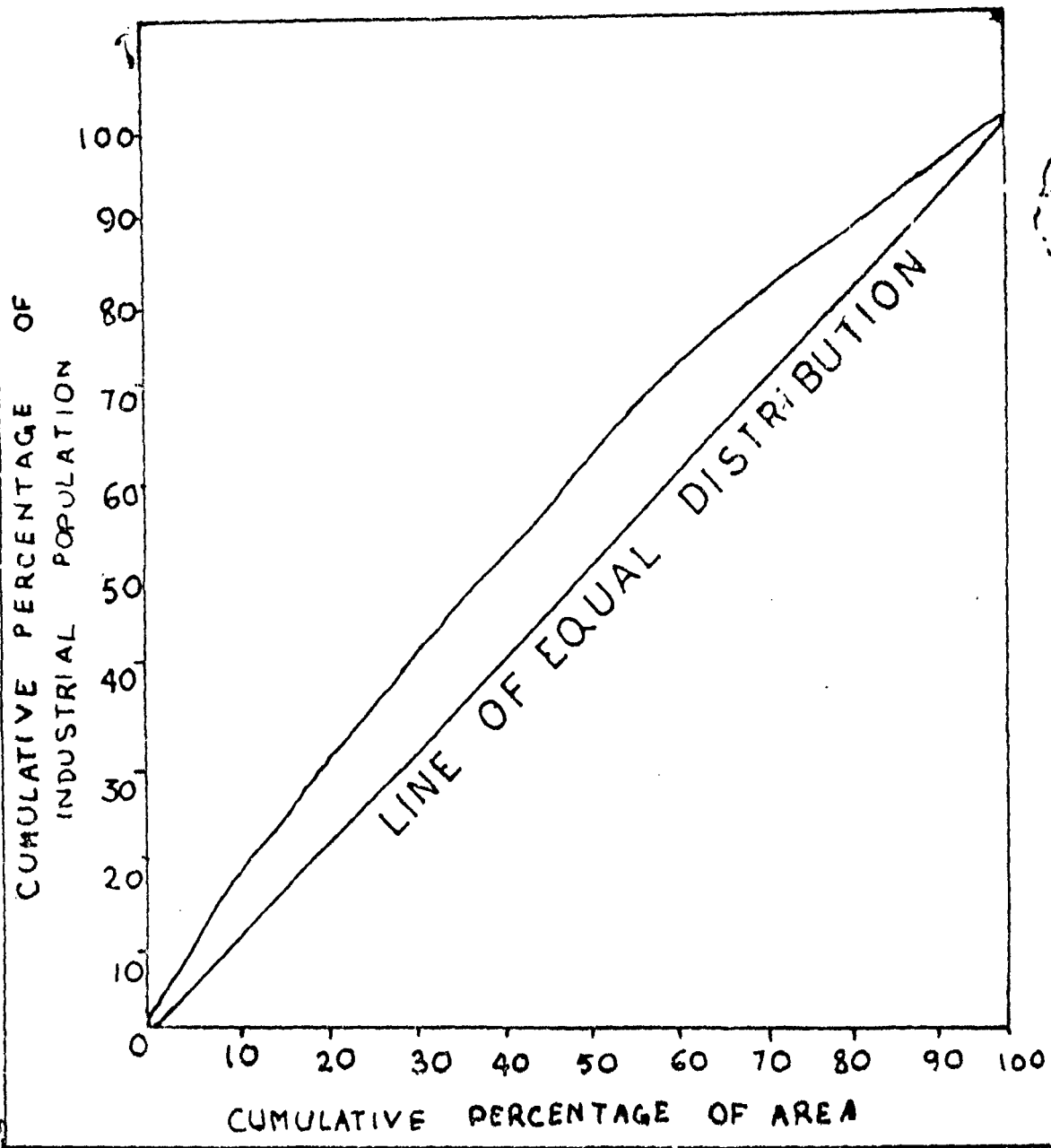
Source : Census Handbook, Birbhum, 1981.

From the above table it is obvious that all Police Stations have higher percentage of population engaged in primary occupations. Rampurhat, Khayrasole, Dubrajpur, Sainthia show some higher percentage of secondary occupation respectively.

TABLE - 2

Police Station	1	2	3	4	5	6	7	8	9
		Cultiva- tors	Agri- labours	Livestock fishing, hunting and other activities	Mining and Quaring	Household Industry and other than	Trade and Comm- erce	Trans- port commu- nica- tion	Other services
1. Murarai		17,240	19,276	234	539	2371	1,465	377	5,146
2. Nalhati		19,575	17,493	146	26	1554	1,258	393	3,098
3. Rampurhat		20,548	22,761	360	13	4130	2,049	1,695	5,457
4. Mayureswar		18,953	18,245	301	4	1201	326	275	2,124
5. Md. Bazar		7,815	11,736	466	176	957	459	58	1,568
6. Rajnagar		4,911	5,975	88	1	110	318	114	1,447
7. Khyarasole		8,964	9,815	297	600	1853	738	155	1,720
8. Dubrajpur		9,377	14,511	204	43	2460	1,506	687	3,050
9. Suri		8,509	13,162	554	54	2191	2,125	948	6,435
10. Illambazar		9,934	10,038	718	8	798	424	69	1,386
11. Sainthia		10,973	14,872	381	8	2270	2,030	1,192	2,708
12. Bolpur		11,277	17,351	402	21	2101	1,392	769	4,246
13. Labpur		13,176	11,171	154	21	901	484	63	2,028
14. Nanoor		13,991	12,991	49	11	963	841	110	1,828
		175,263	200,999	4323	1525	23860	16,315	6,925	42,241

LORENZ CURVE



Based on the above table the following table has been constructed (Section-A) which contains the data illustrating the percentage of employment in the occupational groups for the year 1981 by accumulating the data from the highest.

INDEX OF DIVERSIFICATION

<u>Occupational groups</u>	<u>Percentage of population</u>	<u>Progressive percentage...</u>
1. Cultivators	37.03	37.03
2. Agricultural Labour	42.26	79.29
3. Livestock etc.	0.92	80.21
4. Mining and Quarring	0.33	80.54
5. Household Industry	2.52	83.06
6. Other than household Industry	2.74	85.80
7. Construction	0.38	86.18
8. Trade and Commerce	3.44	89.62
9. Transport and Communication	1.46	91.08
10. Other Services	8.92	100.00
	<hr/> 100.00	<hr/> 812.81

- (1) Crude diversification Index
 = (by adding μ cumulative per cent)
 = 812.81.

(Section - B)

Occupational groups	Percentage of total works	Total workers	Industrial workers	Percentage of Industrial workers	LQ B/A.
1. Murarai	9.64	57956	3004	14.08	1.43
2. Nalhati	9.69	57121	2011	9.42	0.97
3. Rampurhat	12.61	74327	4803	22.51	1.79
4. Mayureswar	9.43	55578	1498	7.02	0.74
5. Md. Bazar	5.04	29715	761	3.57	0.71
6. Rajnagar	2.56	15094	947	4.44	1.73
7. Khayrasole	4.28	25238	1117	5.24	1.22
8. Dubrajpur	6.06	35691	1437	6.73	1.11
9. Suri	7.37	43408	1172	5.49	0.74
10. Illambazar	4.77	28126	1480	3.19	0.67
11. Sainthia	7.54	44433	1469	6.88	0.91
12. Bolpur	8.55	50359	1030	4.55	0.53
13. Labhpur	5.70	33566	894	4.10	0.74
14. Nanoor	6.56	38618	594	2.78	0.43
	100.00	589230	21337	100.00	

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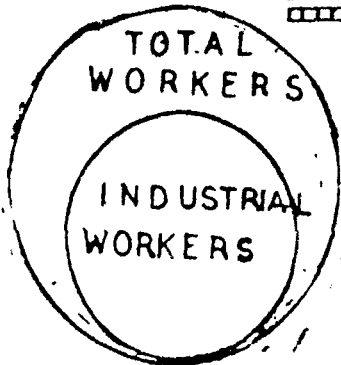
BIRBHUM DISTRICT

PROPORTION OF INDUSTRIAL WORKERS TO TOTAL WORKERS

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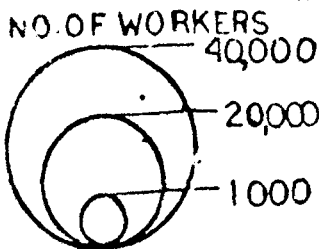
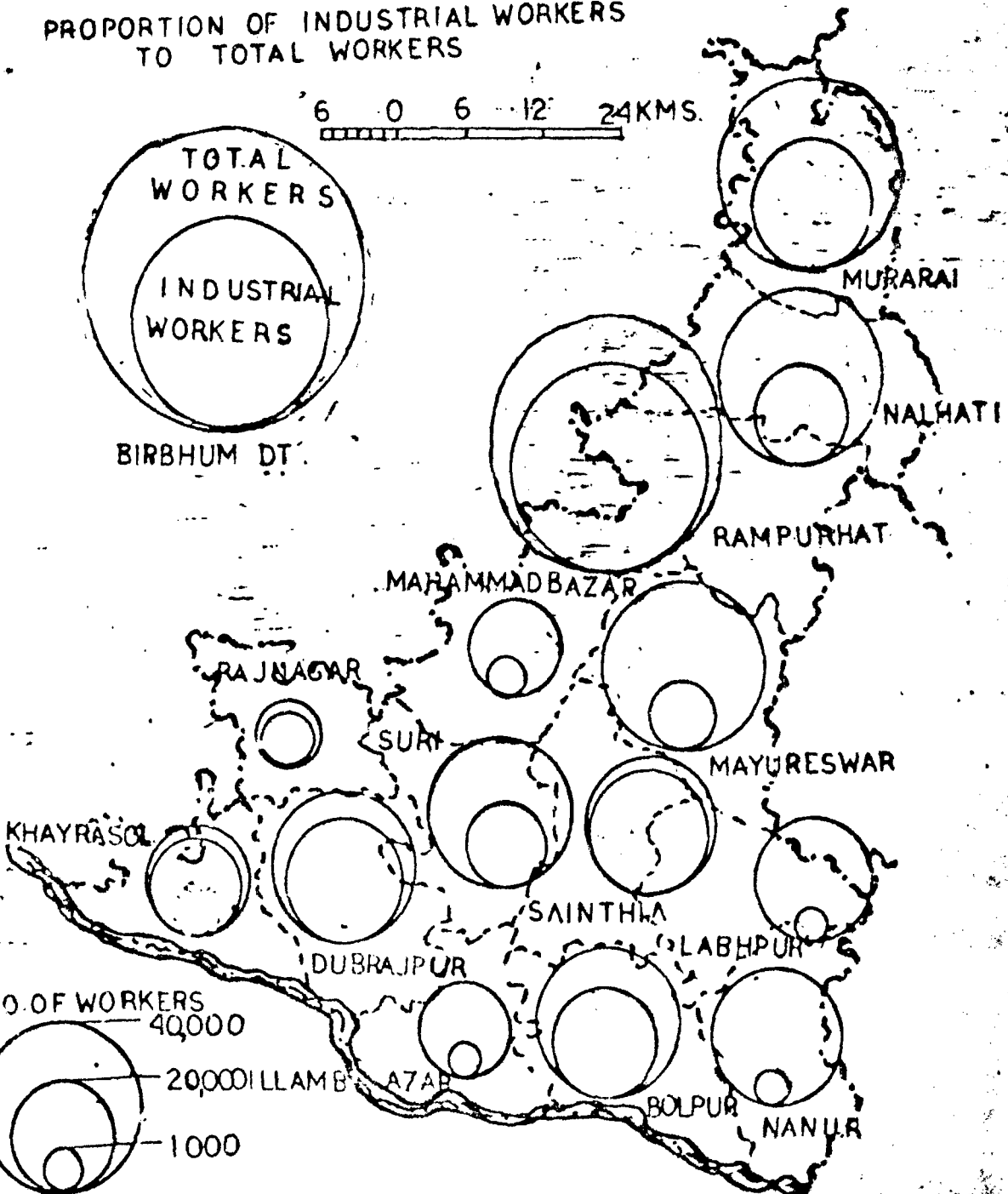
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In the above table, the relation concentration or dispersal of industrial workers in all industries have been worked out based on 'Location Quotient'. The rationale behind the LQ is that a similar proportion of employment in all industries (i) in the police station to that of all industrial employment in the region would indicate a measure of self-sufficiency location quotient below unity express deficiency in a characteristics i.e. the region is net importer or suggests that an industry is less developed in that locality than in manufacturing in general. Based on the computed location quotient a choropleth map has been drawn (Fig. ()) which shows a special discrepancy of the concentration of industrial employment within the district. The location quotient shows that Ramhuthat Police Station has the highest concentration of industrial activity. Murorai, Rajnagar, Khayarasol and Dubraipur show the higher concentration of location quotient values. But rest of the Police Stations are the lower location quotient values.

The Co-efficient of localisation is alienated by summing either positive or the negative deviations of the percentage of manufactural population in all industries in all police stations, from the total working population of the police station as a percentage of all workers. Here the table below represents the computation of co-efficient of localisation.

Police Station	Percentage of total workers (A)	Percentage of industrial workers (B)	d (=> A B (+)
1. Murarai	9.84	14.08	9.24
2. Nalhati	9.69	9.42	4.73
3. Rampurhat	12.61	28.52	9.91
4. Mayureswar	9.43	7.03	2.41
5. Md. Bazar	5.04	3.57	1.47
6. Rajnagar	2.56	4.44	1.88
7. Khayrasole	4.28	5.24	0.96
8. Dubrajpur	6.06	6.73	0.67
9. Suri	7.37	5.49 [*]	1.88
10. Illabazar	4.77	3.19	1.58
11. Sainthia	7.54	6.88	0.66
12. Bolpur	8.55	4.55	4.00
13. Labhpur	5.70	4.19	1.52
14. Nanoor	6.56	2.18	3.78

$$Ed = 27.39 \quad Ed = 17.30$$

Co-efficient of localisation

$$= \frac{Ed}{100} \quad \frac{1009}{100} = 0.1009$$

Where, d is the difference between the two data sets.

A co-efficient of localization of O.O. represent complete coincidence of selected industry with all occupational and 1.0 represents extreme differentiation. Here the computed co-efficient of localisation is 0.1009 which signifies complete coincide of selected industries.

Based on the same data sets for the co-efficient of localization, 'Co-efficient of Geographical Association' or the index of similarity has been computed for all the industries. It is also called the 'coefficient of linkage'. It is a more general measure than the location quotient since it does not measure anomalies at individual localities but deals with the studied area as a unit. It compared me

$$\text{Co-efficient of linkage} = 1 - \frac{Ed}{100}$$

$$\begin{aligned} \text{or } 1 - \frac{10.09}{100} &= 1 - 0.1009 \\ &= 0.90 \end{aligned}$$

Where, d is the difference between the two sets. The higher is the computed value, the closer the correlation between the industrial employment and working force. Here the computed index of similarity is 84 which is more or less equal to unit. Therefore, the area under consideration has a clear linkage between the manufactural population and the total working population.

CHAPTER - III

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