

CHAPTER - I

A BRIEF HISTORY OF THE DEVELOPMENT OF SUGAR

INDUSTRY IN INDIA.

- 1.1 Early Growth
- 1.2 Progress of the Sugar Industry in Pre-independence period.
- 1.3 Development of Sugar Industry during post-independence period.
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-: C H A P T E R - I :-

A BRIEF HISTORY OF THE DEVELOPMENT OF SUGAR
INDUSTRY IN INDIA.1.1 EARLY GROWTH

It was only towards the end of the 19th century when sugar factories in the modern sense commenced operation. The technique of production of white sugar from sugar cane has been quite old in India. India has been known as the original home of the sugar and sugarcane. As early as mention of its being in some of the legends concerning Buddha period about the 4th century B.C. commercial manufacturing and refining developed in Egypt during the 9th and 10th century. The crusaders brought back France in the 11th and 12th centuries, after that time the commercial development and use became wide spread in Europe. Alexander, the great and his soldiers were the first Europeans to see the sugarcane in India. It will, thus, be evident that India happens to be the birth place of this important sugarcane. "A Chinese Encyclopaedia, written about the middle of the 16th century, is an ample evidence of India's highly developed art of sugar making, when the Chinese Emperor Tai Tsung sent his man to Magadh (Bihar) to study her sugar industry. But with the establishment of the East India Company, the industry in India received a setback." (1)

The mention of Sugar 'Sharkara' is also seen in the ancient shastras of the Hindu, where it has been elassed as one of the five celestial sweets. The modern word 'SUGAR' is coming from the ancient 'Sharkara'. "The process was simple. The cane cut into peices and crushed by heavy weight and the juice thus obtained was boiled and stirred until solids formed. These solids being of uneven shapes and size were called 'Sharkara' a sanskrit term of gravel." (2)

The sugar factory on modern line was started first by 'Datch' in North Bihar about 1840, but this factory was not successful. The sugar mills in modern world were started about 1903 by the Britishers.

1.2 PROGRESS OF SUGAR INDUSTRY IN PRE-INDEPENDENCE PERIOD :

Sugar industry was originally located in Uttar Pradesh and Bihar and in other developing parts of the country. Because of the unique geography of India, its physical contiguity, good climatic condition, mountains and rivers, easy availability of capital and enterprise and because of extensive cultivation of sugarcane on waste irrigation lands and modern technology, sugar industry had been located in North India. But latter on the sugar industry was developed in South.

The first vacuum pan sugar factory in India was set-up in the year of 1903 at Mairwa in Uttar Pradesh. "The industry had a modest beginning in 1903, when the first sugar factory was established, but with the grant of protection by the then British Government in 1932, the industry came into prominence." (3) The protection was granted, because until 1930, India was one of the biggest free markets of the world for sugar trade, the Indian sugar industry was at that time in its infancy and could not compete with the foreign sugar. In 1950, after 18 years, protection was withdrawn. There was phenomenal expansion of sugar industry, so that in 1936-37, India became self sufficient in the field of sugar supplies. But between 1937 and 1942, the industry lapsed into a state of stagnation because of over production with entry of Japan into the World War II. After getting protection, the sugar industry took rapid strides, from 29 working units in 1930-31, the number of sugar factories rose to 130 in 1935-36 and the production of sugar increased from 1.2 lakh tonnes to 9.3 lakh tonnes.

The Tariff Board was appointed in 1937, because the protective policy was given to the sugar industry and further more that sugar industry protection act was passed in 1939, which provided for import duty. Protection was provided during last World War II.

The beginning of imports, however, resulted in the reduction of the goods customs duty. Therefore, the Government for the first time imposed excise duty on factory produced sugar. The provincial government enforced a minimum price to be paid by the factories to the sugarcane grower.

The progress of sugar industry in the pre-independence period is shown in the following table.

Table No. 1 : A number of sugar factories and sugar production in pre-independence period

Year	No. of factories	Sugar production (Lakh tonnes)
1930-31	29	1.2
1935-36	135	9.3
1940-41	148	11.1
1945-46	145	9.6

SOURCE : Co-operative Sugar, May, 1983

The above table indicates that the number of factories increased from 29 in 1930-31 to 145 in 1945-46 and also sugar production of these factories increased from 1.2 lakh tonnes in 1930-31 to 9.6 lakh tonnes in

1945-46. The number of sugar factories rose to 148 and the production of sugar increased to 11.1 lakh tonnes in 1940-41.

1.3 DEVELOPMENT OF SUGAR INDUSTRY DURING POST-INDEPENDENCE PERIOD.

After the independence, India has been making remarkable progress through the successive Five Year Plans in agriculture, industry and other economic fields.

During the plan period, the industry exceeded the targets fixed for the five year plans. There was seasonal set-back, however, in 1968-69, when the production sharply decreased because large tracts of cane had been affected by the conditions of drought that hit most sugar producing States. Between 1955-56 and 1960-61, the number of factories rose from 143 to 174, while production rose from 18 lakh tonnes to 30 lakh tonnes. In the following 25 years the number of factories as well as the production doubled again.

The table given below shows the growth of sugar industry and sugar production during past-independence period.

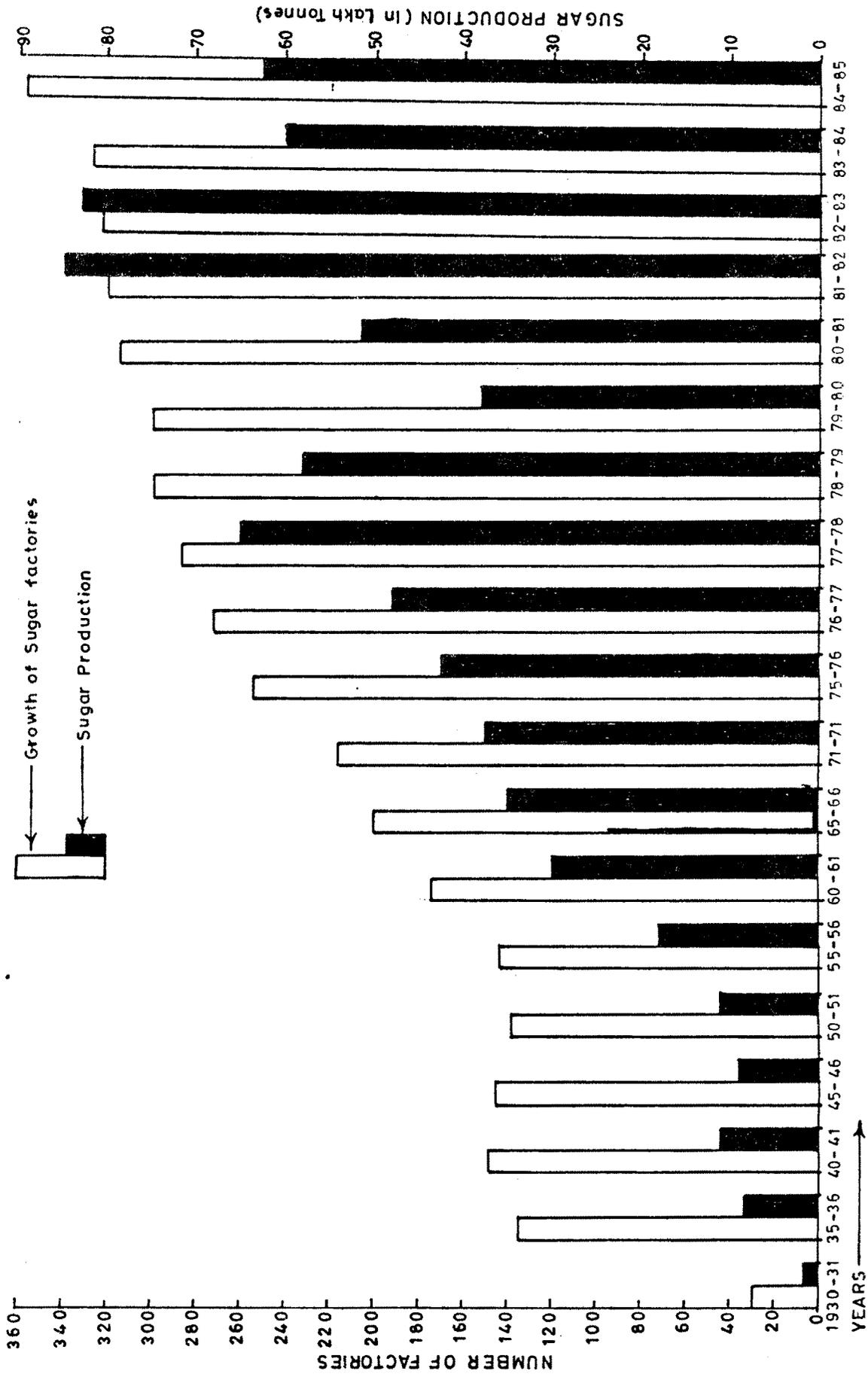
Table No. 2 : Growth of Sugar Factories and
Sugar Production.

Year	No. of factories	Sugar Production (Lakh tonnes)
1950-51	138	11.2
1955-56	143	18.3
1960-61	174	30.5
1965-66	200	35.3
1970-71	216	37.4
1975-76	253	42.6
1976-77	271	48.4
1977-78	286	64.6
1978-79	299	58.4
1979-80	299	38.6
1980-81	314	51.7
1981-82	319	84.4
1982-83	320	82.3
1983-84	325	59.2
1984-85	356	62.0

SOURCE : Indian Sugar Mills, Association, Indian
Sugar, April, 1985.

The above table shows that after getting protection, India became practically self-sufficient in respect of sugar. Most of these factories in northern

GROWTH OF SUGAR FACTORIES & SUGAR PRODUCTION IN INDIA 1930-85



region of Bihar and Uttar Pradesh were in the private sector. Since 1951, there has been a rapid and significant growth of the co-operative sugar sector in the country. The number of sugar factories rose from 138 in 1950-51 to 356 in 1984-85 and production of sugar increased from 11.2 lakh tonnes to 62.0 lakh tonnes.

1.4 STATE-WISE DISTRIBUTION OF SUGAR FACTORIES :

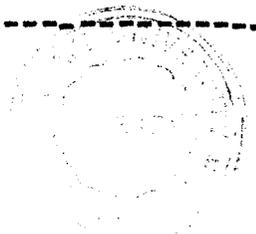
The sugar industry was originally localized in U. P. and Bihar and other northern areas. It is interesting to note that the industry first developed in Northern India because of easy availability of capital and enterprise and because of extensive cultivation of sugarcane on vast irrigated lands. But latter on, the industry was developed in south.

The following table gives an idea about state-wise distribution of area under sugarcane, duration of crushing season and average recovery in 1983-84.

Table No. 3 : State-wise Distribution of Sugar
Factories in 1983-84.

State/Territory	Area (000 hect.)	No. of Facto- ries.	Duration of cru- shing season (in days)	Average Recove- ry. (Percen- tage)
Andhra Pradesh	141	31	66	9.66
Assam	49	1	76	8.16
Bihar	128	28	75	9.13
Gujarath	103	12	132	10.52
Haryana	134	5	154	9.07
Karnataka	183	24	95	10.19
Kerala	83	2	79	7.93
Madhya Pradesh	70	8	113	9.43
Maharashtra	294	78	122	11.13
Orissa	42	3	71	9.32
Punjab	84	8	137	10.47
Rajasthan	37	3	87	9.44
Tamil Nadu	157	23	120	9.30
Uttar Pradesh	1704	93	126	9.33
West Bengal	20	2	21	7.42
Goa	N.A.	1	-	-
Pondicherry	2	2	-	-
All India	3167	326	111	10.02

SOURCE : Indian Sugar Mills Association,
Indian Sugar, April, 1985



Above table shows that "sugar cane is grown widely in India. In all 15 out of the 22 States and two out of the 9 union territories grow sugar cane. Uttar Pradesh is the number one state in this respect. In 1983-84, it had 93 factories and 17 lakh hectares under sugar cane. Maharashtra ranked next with 8 78 factories and 3 lakh hectares under sugarcane, Andhra Pradesh ranked third in respect of number of factories but fifth in respect of area under sugarcane." (4)

An important feature of the production efficiency of the sugar factories in south is higher and cost of production is lower than in North, for in south the duration of crushing season is greater than that of North.

1.5 EMERGENCE OF CO-OPERATIVES :

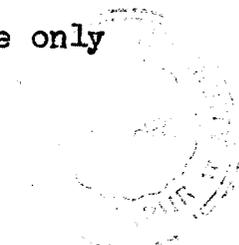
Factories of new types were established and the old set-up of the industry was completely changed with the following views :

- i) To increase the capacity of sugar production,
- ii) Preference to be given to the co-operative sector according to industrial Act of 1951,
- iii) There was a need to provide stable market and remunerative price to the cane growers.
- iv) Manufacturing sugar factory could be controlled by the sugar cane growers,

- v) To establish sugar factories in canal irrigated area.

The sugar co-operatives have been the most dominating processing co-operatives in Maharashtra. "India has the world's largest co-operative sector of sugar industry, followed by Brazil having 72 co-operative sugar factories managed by an organization known as 'COPER-SUGAR' at Sab Paulo. The Indian Co-operative Sector of the sugar industry has contributed 59% of the national sugar production. 30 more new co-operative sugar factories are under various stages of establishment. Thus, India will have about 400 sugar factories in the period of 3 to 4 years." (5)

Co-operative sugar factories have long been accepted as an instrument of economic development particularly in rural area since the beginning of the India's programme of planned development. "After the independence, the Government of India, in order to promote the interests of sugarcane growers, encouraged setting-up of co-operative sugar factories in various parts of the country. Sugar factories in the co-operative sector were given preference in licensing under the Industries (Development and Regulation) Act, 1951, with the Government help and preference, the growth of co-operative sugar factories became rapid in the country. Whereas between 1933 and 1935 there were only



4 co-operative sugar factories in the country. Their number increased to 156 by 1982-83." ⁽⁶⁾ At present, there are 183 co-operative factories in the country in 1985-86.

Given below is the State-wise co-operative sugar factories in 1983-84.

Table No. 4 : State-wise Co-operative Sugar Factories in India 1983-84.

State/Union Territory	No. of Factories		Percentage of Sugar produced by Co-operative to the total sugar production
	Number	% of the total number of Co-operatives in India.	
1	2	3	4
Andhra Pradesh	17	10.6	33.6
Assam	2	1.3	100.0
Bihar	-	-	-
Gujarath	12	7.5	100.0
Haryana	4	2.5	43.6
Karnataka	1	0.6	80.0
Kerala	13	8.1	47.5
Madhya Pradesh	3	1.9	31.1
Maharashtra	67	41.9	90.5
Nagaland	-	-	-

Contd...

1	2	3	4
Orissa	4	1.3	94.1
Punjab	4	2.5	58.2
Rajasthan	1	0.6	21.7
Tamil Nadu	11	6.9	41.5
Uttar Pradesh	21	13.1	17.8
West Bengal	-	-	-
Goa	1	0.6	100.0
Pondicherry	1	0.6	21.0
All India	160	100.0	53.9

SOURCE : National Federation of Co-operative Sugar Factories Ltd., New Delhi, Co-operative Sugar, June, 1985.

Above table shows that Maharashtra is considered to be one of the leading States in India in the Co-operative field. Maharashtra accounted for 42% of the factories and 54% of sugar production in the co-operative sector in 1983-84.

1.6 IMPORTANCE OF SUGAR INDUSTRY IN NATIONAL ECONOMY :

The sugar industry is the back bone of the Indian economy. The sugar industry has played an important and positive role in the development of the country's economy.

The sugar industry is the second largest agro-based industry next to Cotton Textile. To-day India is the third largest producer of cane sugar in the world next only to Brazil and Cuba; India occupies the 11th position amongst 80 cane sugar producing countries of the world in regard to yield of sugar cane per hectare and 7th position in regard to recovery of sugar from sugar.cane in 1981-82.

"Sugar is a major industry in the organised sector with some Rs. 2,500/- crores investment and over 300 sugar mills spanning actually the entire country, the importance of this industry in the rural and industrial economy of the country is self-evident. Apart from 20 million cultivators and 2.4 lakh employed in sugar mills, many more thousands depend on this industry, directly or indirectly. The growth of other industries like distilleries, confectionary and biscuit manufacturing is linked to sugar industry, not to mention the use of by products like bagasse in the production of paper and contribution to the exchequer by way of the **exise** duty, cane ~~cess~~ and purchase tax." (7)

Co-operative sugar factories are large modern industrial units. Each factory has a membership of 2,000 to 4,000 cane growers and operational area of 50 to 100 villages. Co-operative sugar plants crushed 2,00,000 to 4,00,000 tonnes of sugarcane annually during the season.

Each factory has an employment ranging from 501 to 1000 man years. "As many as 44% of the establishments reported that they were not operating at full capacity. The major reasons cited for this was shortage of raw material and unforeseen break-downs." (8) Each factory is managed by the Board of Directors elected by its sugar cane grower share holders. As the factory plays an important part in economic life of its shareholders and others and has vast resources in terms of man power, money and material , there is keen competition among the leaders to acquire control over it.

1.7 SUGAR CO-OPERATIVES IN MAHARASHTRA :

The sugar co-operatives have been the most dominating processing co-operatives in Maharashtra. The co-operative sugar industry in Maharashtra had ranked first in India in 1981-82. The 1/3rd portion of Maharashtra is drought prone area. In Maharashtra, there are 19 sick sugar factories in January, 1986. In recent years, there are 85 sugar factories and co-operative sugar factories amounted to 76 and private amounted to one sugar factory which is under the joint management in Maharashtra. At present, in Maharashtra, there are 22 distilleries and 8 paper factories and 4 Arkshallas.

Beginning with the establishment of co-operative sugar factory known as Pravara Co-operative Sugar at Loni in Ahmednagar District of Maharashtra State and with the success of this venture, a agriculture processing and marketing in the co-operative sector received a shot in the arm.

The sugar factories have become the centres of socio-economic life of the rural people, it has become an instrument of bringing about economic prosperity and development to the rural area. "The primary objective of a processing society is to render mutual processing service and to obtain for the grower, the margin that would accrue from selling the processed goods." (9) The sugar factory also changed the environment wherever it has established schools and colleges, hospitals, gardens etc.

The rapid increase in the number of co-operative sugar factories in Maharashtra State must be attributed to a number of favourable factors such as an agro-climatic condition, land suitable for cultivation of sugar cane, fertilizers, soil, availability of irrigation facilities, easy availability of labour, control of khandsari and gur producers and adoption of a new and improved technology.

But it is also an unfortunate fact that the management of co-operative factories are suffering from party politics, because the party in power is interested to have a hold on Board of Directors. Due to the change from year to year, who are employing their power for achieving their own selfish aims, the workers in the factories feel insecure. "On the management front also, it is generally accepted that there is a need and scope for improvement. Particularly, the producer members and other representative directors could be expected further to develop a sense of proportion as to matters that are important and desirable in the long term interest of both the producer members and their co-operative societies."
(10)

The table given below gives the idea of the district wise growth of sugar co-operatives in Maharashtra.

Table No. 5 : District-wise growth of Sugar
Co-operatives in Maharashtra.

District	No. of Factories	Production of sugar (in bags) (in quintles)	Average Recovery (%)
Ahmednagar	12	41,38,724	11.41
Nasik	6	12,44,594	11.03
Poona	6	15,54,787	11.37
Solapur	6	13,39,290	10.44
Kolhapur	10	36,42,699	11.80
Satara	6	18,43,302	11.35
Sangli	5	14,86,483	11.59
Dule	4	6,05,675	10.48
Jalgaon	3	5,81,920	10.34
Beed	4	3,77,115	10.14
Nanded	4	1,40,414	9.74
Aurangabad	5	1,71,444	10.72
Parbhani	3	1,26,164	10.72
Buldhana	1	30,780	10.24
Maharashtra	75	1,82,66,897	11.17

SOURCE : Godwa, August, 1985. Page No. 1

1.8 SUGAR INDUSTRY IN KOLHAPUR DISTRICT :

Kolhapur district is localized in the Southern part of Maharashtra and is the adjoining district to Karnataka State. Kolhapur district is divided into 12 taluka's and there were 1,208 villages and 11 towns with population of over 2.5 million in 1981.

The district covers the earlier princely State of Kolhapur and has ever been one of the prosperous areas of the Deccan, which has never experienced famine in its history, is gifted with a fertile soil, good rainfall and abundance of ground water. As many as 5 rivers originating from the Western Ghats flow through the districts and irrigate its fields. The District Gazetteer of 1887 described the people in the state as enjoying 3 meals a day, 3 pieces of trees to wear and 3 roomed houses for the families to live in. "The labouring and agricultural classes." It says, "are neat and clean in their dress but seldom rich enough to indulge their test for refinery."

Kolhapur is known to be producing sugarcane from the middle of the 18th century. Kolhapur gur has been famous for its quality and Kolhapur market equally notorious for the exploitation of the producer till Shri. Tatyasaheb Mohite transformed the situation in early 50's by organising The Kolhapur District Co-operative Marketing Society and

setting-up a regulated agricultural produce market.

"After the success of the first co-operative sugar factory at Pravaranagar in Ahmadnagar district in 1951., the farmers in Kolhapur started organising themselves to set-up similar sugar factories on co-operative lines. Their efforts took concrete shape in 1955 and 3 such factories started production in 1959. The main motivation in setting up these ventures was to protect sugarcane growers from exploitation by the private sugar factory and the uncertainties of the gur market. Out of the total sown area of over 4 lakh hectares, over 50,000 hectares are devoted to sugarcane." (11)

Recently, there are 10 co-operative sugar factories in the district. These factories supported by 264 lift irrigation and 9 dam construction societies. Their daily crushing capacity ranged from 1,250 tonnes to 5,000 tonnes.

The table given below shows the present situation of the sugar co-operative factories in Kolhapur district in 1984-85.

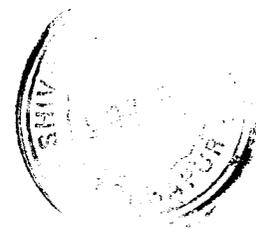


Table No. 6 : Factory-wise total crushing of sugarcane, duration of crushing season, total sugar production and average recovery in 1984-85.

Name of the Factory	Duration of crushing season(days)	Crushing of sugar cane(M.T.)	Sugar Production (bags)	Average Recovery (%)
Bhogawati.	156	42,9,084	5,28,156	12.29
Chh. Shahu.	111	1,68,135	1,95,985	11.64
Datta Shetakari.	142	3,40,858	4,15,050	12.17
Doulat Shetakari.	144	2,26,881	2,74,185	11.66
Dudhganga Vedaganga.	146	2,44,707	2,83,650	11.59
Gadhinglaj.	142	2,33,126	2,56,355	11.00
Kumbhi Kasari.	156	4,58,414	5,39,775	11.88
Panchaganga	171	8,43,284	9,67,801	11.58
Warana.	123	4,43,873	5,51,771	12.37
Kolhapur Cane Sugar Works.	100	2,08,146	2,30,460	10.67
Kolhapur District		35,97,047	42,44,088	11.80

SOURCE : Godwa, August, 1985.

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Sugar co-operative factories in Kolhapur district is an integrated part of the rural area. Factories have changed the economic and political life of the district in a number of ways such as generating educational facilities, housing colony, welfare facilities to the workers and cultural activities etc.

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1.9 DESIGN AND RESEARCH METHODOLOGY :

Research design is the most important part of the research project. This study is explorative and educative and with this in mind the research design was prepared.

1.9.1 Selection of the Topic :

Selection of the research topic was finally made after consulting the research guide in the month of October, 1985. Simultaneously the research design which is going to be used for data collection was also planned by me with the help of a guide.

We have selected the topic for an empirical study entitled, " A Case Study of Socio-economic Conditions of the Workers in Shree Datta Shetakari Sahakari Sakhar Karkhana Ltd., Shirol." Since the sugar co-operatives have been located in rural areas and a large majority of the workers have been drawn from rural populations belonging to different socio-economic strata, we decided to undertake the study of changes in the socio-economic conditions of the workers in the above mentioned factory.

For the survival of the workers as human beings there are some basic needs to be satisfied viz., food, clothing and shelter etc., but even after 35 years of planned economic development in our country, a large chunk of the rural population is still unable to meet even minimum of basic requirements of human life. They do not even possess adequate purchasing power to buy as much food as they require. Ultimately their socio-economic status is badly affected. The draft outline of the first Five Year Plan has also indicated that "the workers is principal instrument in the fulfilment of the tragetes of the plans and an achievement of economic progress in generally." (12) The efficiency i.e. the capacity to produce of the workers is largely affected by his family life, his status in the village society, his physical ability and the standard of living. With rapid industrialization and implementation of the policy of decentralisation of industries, it is expected by the planners and the policy makers as well, that there would be a gradual improvement in the socio-economic conditions of the rural population. With this view in our mind, the present study is undertaken with a view to investigating into the changes that have taken place in the socio-economic conditions of the workers with special reference to Shree Datta Shetakari Sahakari Sakhar Karkhana Ltd., Shiról.

1.9.2 Methodology and Data Collection :

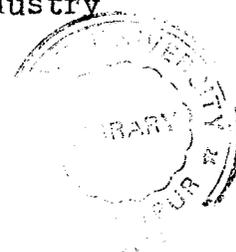
The present study being a case study, we confined our enquiry to permanent and seasonal workers in the factory. We have excluded the temporary, trainee and probationary workers from the scope of our present study. Since the purpose of the present study, is to ascertain whether there is an improvement in the overall socio-economic conditions of the skilled and unskilled workers or whether there is a deterioration in their standard of livings. We limited our field of enquiry to the workers of the Engineering, Manufacturing and Cane Yard departments of the factory.

Out of 976 various types of workers employed in as many as 22 various departments of the factory, a little more than 50% (49.7%) workers of the working in the departments stated earlier. Instead of employing a census method for data collection, we have selected 110 workers at random for our enquiry. This could be considered as representative sample, as rest of the workers are on par with others in respect of their wage structure, socio-economic conditions and in other respects too.

For carrying out our field enquiry, we formulated a comprehensive questionnaire covering socio-economic-politico-cultural aspects of the life of the workers in the factory. However, we have put an emphasis on the socio-economic aspects. While formulating the questionnaire (Appendix No. 1) the author of the present dissertation administered the questionnaire personally to the selected workers. This field of enquiry was conducted during the period when the factory was in operation. It is worthwhile to note that while conducting the field study, an useful dialogue took place between the researcher and the respondents. The dialogues that took place was quite helpful to make a guess in regard to their views on existing wage structure, its different components and their attitude towards the present inflationary situation in the economy. This further enabled us to draw certain conclusions and to make suggestions which we have tried to sum-up in the last chapter No. VI, Summing-up and Conclusions.

1.9.3 Plan of the Study :

The sugar industry, being second in importance to the cotton textile industry, we began the present study by tracing historical development of the industry.



in India as a whole in the Chapter No. 1. Since Maharashtra ranks first in the field of sugar co-operatives, we have tried to analyse the different stages of the growth of sugar co-operatives in Maharashtra in the same chapter. After having discussed in brief, the development of the industry in India and particularly in Maharashtra state, we come to the analysis of the development of the industry in the co-operative sector in Kolhapur district which ranks second to Ahamednagar district of Maharashtra.

In the Chapter No. II, we switched over to the analysis of the development of Shree Datta Shetakari Sahakari Sakhar Karkhana Ltd., Shirol, which is the kind-pin of our present study.

In Chapter No. III, we attempted to have brief resume of the changes in the socio-economic conditions and problems that have arisen as a result of those changes, which are consequent upon rapid industrialization of our country.

In Chapter No. IV and V, which contain the main theme of our study, we have made a rather laborious attempt to analyse critically the changes in the socio-

economic conditions of the workers in the factory in question.

Lastly in Chapter No. VI an attempt is made to sum-up the whole study in brief and to draw conclusions and make certain suggestions to the management of the factory. By the by, we have excluded the welfare measures implemented so far by the factory and their impact on the workers' socio-economic conditions from the scope of our study.

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