

**STATUS OF THE COTTON TEXTILE INDUSTRY IN BIRBHUM,
BURDWAN AND HOOGHLY DISTRICTS OF BURDWAN
DIVISION DURING 1757 -1857: A CRITICAL OVERVIEW**

**Thesis submitted to the
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By

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*Dedicated to
my late father*

Gopinath Bhadra

*who had been a source of inspiration
and support all through my career*

I declare that the thesis entitled "STATUS OF THE COTTON TEXTILE INDUSTRY IN BIRBHUM, BURDWAN AND HOOGHLY DISTRICTS OF BURDWAN DIVISION DURING 1757 -1857: A CRITICAL OVERVIEW" has been prepared by me under the guidance of Dr. Indrajit Ray, Professor, Department of Commerce, University of North Bengal. No part of this thesis has formed the basis for award of any degree of fellowship previously.

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Date: 6.7.2015



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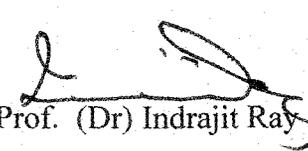
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Certificate

This is to certify that Shri Siddhartha Bhadra has been pursuing research work for last seven years and has fulfilled all requirements of the ordinances relating to Doctor of Philosophy of University of North Bengal. The topic of his research is "STATUS OF THE COTTON TEXTILE INDUSTRY IN BIRBHUM, BURDWAN AND HOOGHLY DISTRICTS OF BURDWAN DIVISION DURING 1757 -1857: A CRITICAL OVERVIEW". He has completed his work and the thesis is ready for submission. To the best of my knowledge and belief, the thesis contains original work done by the candidate and it has not been submitted by him to any other university for any degree previously. In habit and character, the candidate is fit and proper person for the Ph.D degree.

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Preface

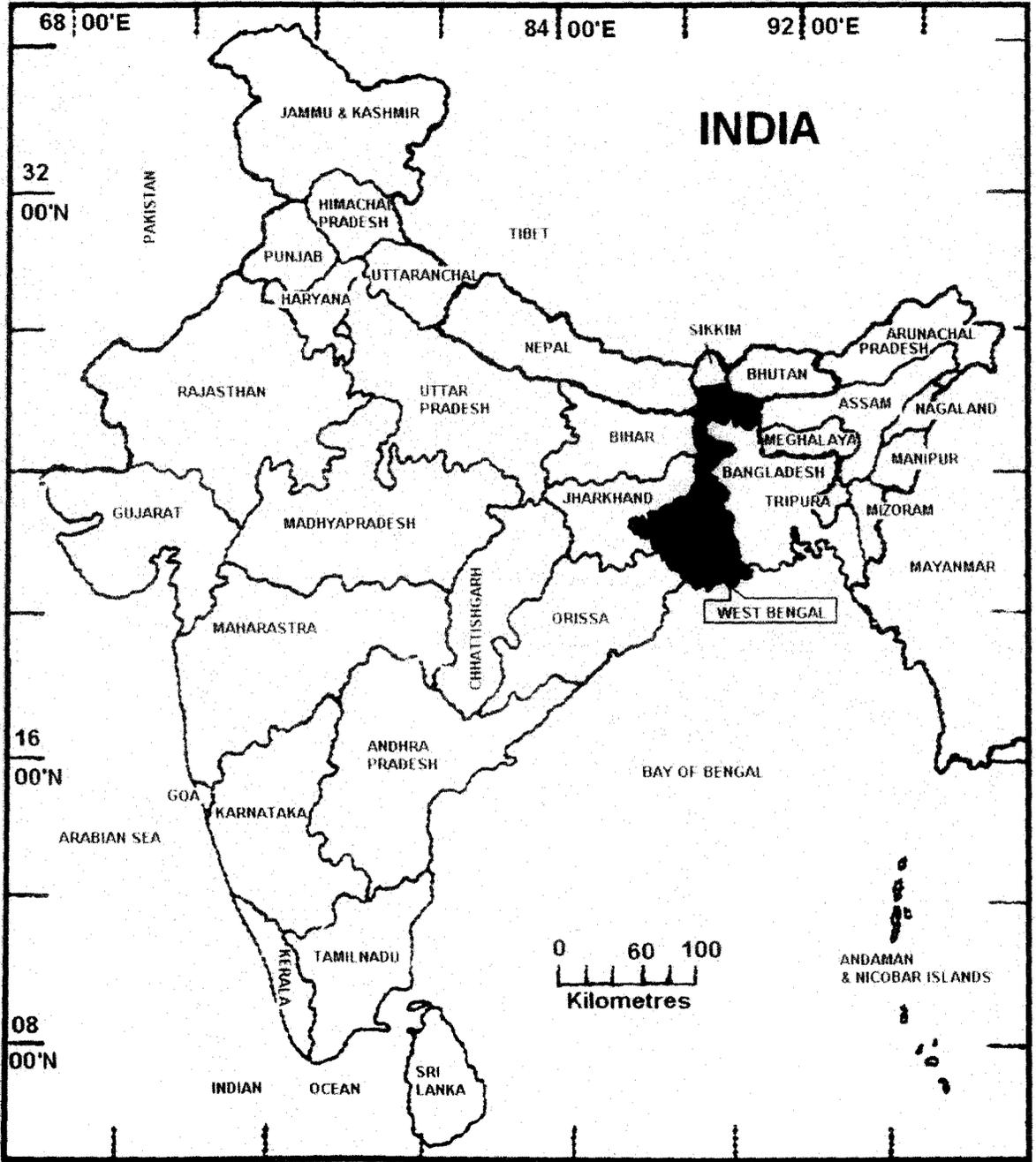
Cotton textile industry was the most important industry among all cottage industries of Bengal that developed in the days of antiquity. A considerable number of studies and research have been devoted to Bengal cotton industry, which offers us a comparative view of the Bengal industry *vis-a-vis* the cotton industry of England. Those studies identify when and how technological innovations in Great Britain gained supremacy over Bengal. The earlier studies have concentrated on cotton industry of Bengal as a whole, but almost none has explored or revealed the real status of the industry in a particular district of Bengal. We find only some studies which attempt to focus on the cotton industries in the district of Dhaka. This study is an attempt to analyse the status of the cotton industry of Birbhum, Burdwan, and Hooghly districts of Burdwan division during 1757-1857.

The cotton textile industry of the above mentioned districts of Bengal grew prior to the advent of the European traders into the districts. The rural cotton industry of those districts used to meet mainly the local needs and that of the neighbouring districts. The fine muslins and calicoes of Burdwan and Hooghly districts had some market in different parts of India and foreign countries as well. The advent of European merchant capital in those districts took place probably in the eighteenth century. Since then, the districts' production of cotton goods gradually became dependent on European capital. The European capital enhanced the productive potentialities in rural cotton industry to a great extent in those districts. A growing market in abroad, particularly in England and other European countries led to a large increase in the production of cotton piece-goods in the districts. The investigation of these developments in the field of manufacturing, the proliferation of trade of cotton piece-goods in those districts, and the assessment of their importance in the economic life of the districts concerned, have been discussed in the thesis.

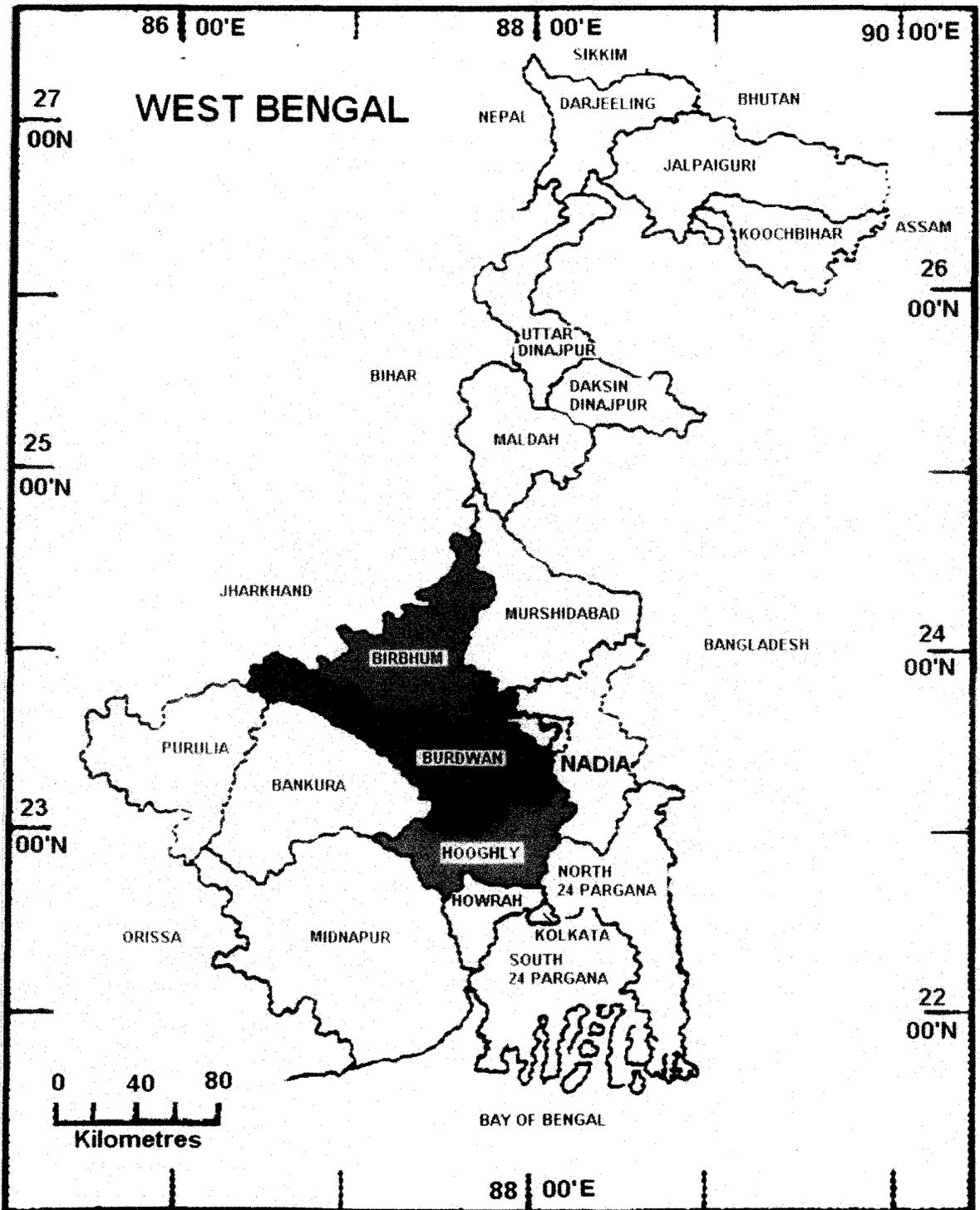
This study elaborately explains the status of the cotton industry of the above mentioned districts and shows its decline from prosperity in the first half of the nineteenth century on the basis of unpublished original primary data which have hardly been utilized so far. Besides, those primary sources, all secondary sources which are relevant to this research topic have also been consulted and taken into account.

The present study is devoted to exhibit the sudden boom of the cotton industry of the above districts in the period under review through the merchant capital of the English East India Company on the one hand. On the other hand it shows the decline of the industry in the first half of the nineteenth century and identifies the actual period as well as the actual reasons behind that demise.

Siddhartha Bhadra
Siddhartha Bhadra 6.7.2015



Map of India



West Bengal District Map

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The responsibility for errors remains mine alone.

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List of Abbreviations

£	Pound Sterling
A	Anna
B.O.R	Board of Revenue
B.O.T	Board of Trade
Comm.	Commercial
C. Rs	Current Rupee
D	Pence
EIC	East India Company
HC	House of Commons
HL	House of Lords
Lb	Pound
Ord.	Ordinary
P	Pie
PP	Parliamentary Paper
Proc.	Proceedings
Rs	Rupee
S	Shilling
Sa Rs	Sicca Rupee
VOC	Verenigde Oostindische Compagnie
WBSA	West Bengal State Archives

Chapter – I

Chapter – I

Introduction

Cotton textile industry of Bengal was the most important industry among all industries that grew as an adjunct to agriculture in Bengal. It was a cottage industry, and innumerable cottages were distributed throughout all villages of almost all districts of Bengal. This industry is marked by its otherwise incongruous combination of the use of extremely simple mechanical device coupled with the exquisite delicacy and beauty of its products. A large number of studies have been made on this Bengal industry, focused mostly on two production-centers in the global context: one at Bengal and other in England. The thrust area of those studies was to identify when and how technological innovations in Great Britain could excel Bengal. This dissertation has its own novelty in that it attempts to analyze the status of the industry in three districts of Bengal, namely Birbhum, Burdwan and Hooghly, something entirely absent or broadly ignored in the earlier studies.

The chapter is divided into two sections. The first Section provides a brief description of the industry and its importance in the contemporary economy, and reviews the existing literatures. Section II provides the chapterization of the study along with their brief descriptions, the research questions that are sought to be investigated in this dissertation and the concomitant methodological issues.

I

Cotton industry in Bengal has had a long saga. It was the staple industry of Bengal even before the colonial period. The status of cotton industry in Bengal bears resemblance with that of silk industry in China, linen industry in Egypt, and wool industry in England. According to Orme, it was difficult to find a village in the province of Bengal where some men, women and children were not employed in

making a piece of cloth.¹ Weaving and spinning were the most important occupation next to agriculture in the village life of Bengal. Long before the British rule in India, the cotton piece-goods of Bengal looms were exported abroad after fulfilling its home demand. The inland and foreign trades of Bengal were prosperous, except the trade with European countries in the first half of the eighteenth century. The Mughal Emperors of Delhi and their provincial rulers used to give possible encouragement to the Bengal weavers. In those times, the cotton weavers of Bengal used to manufacture their goods freely and without any oppression, restriction, limitation or prohibition.² The Mughal Empire was foundered during 1739 – 57, and the British took hold of administrative control in Bengal since 1757. Although, British commerce started in the early seventeenth century, the British East India Company dominated the commerce of Bengal since the middle of the eighteenth century.

Since 1757, during the British rule the production organization of the Bengal cotton industry had changed in several dimensions. The extensive export trade of the British East India Company enhanced the total production of cotton piece-goods in Bengal to a great extent. The period under review, i.e., the period during 1757 - 1857, was an important phase when the Industrial Revolution took place in England. The cotton textile industry was an important industry which proliferated in England through Industrial Revolution. So, the Bengal cotton industry was exposed to face severe competition from the English industry. Here, we wish to highlight the growth of Bengal industry through British trade as well as the problems of the Bengal industry and the Bengal weavers under the British rule in India.

The main thrust area of this study, as the title of my thesis indicates, is on the status of the industry in three districts of Bengal, namely Birbhum, Burdwan and Hooghly. The districts had developed many industries and manufactures, e.g., cotton piece-

¹ Orme, R., *Historical Fragments of the Mughal Empire*, p.409.

² Sinha, N.K., *The Economic History of Bengal*, vol.I, p.159.

goods, silk, sugar, iron etc., prior to the establishment of the district administration by the English although they were agriculture oriented. Before the European traders came to the three districts, their rural industries and manufactures met mainly the local needs and to some extent the needs of the neighbouring districts. The entry of the European merchant capital into the districts had increased the productive potentialities of the districts' industry. In the period under review, the economy of the districts had become dependent mostly on the British capital and the districts' industry had become dependent on the investment of the English East India Company. A growing market abroad, particularly in England and in other European countries in addition to the markets in Batavia, Manila and the East Coast spurred on the production of the districts' industry to a great extent.

Thus the role of cotton textile industry was very vital for the economy of the districts as well as for the economy of Bengal as a whole during that period. A considerable size of population of the three districts as well as of the other parts of Bengal was engaged in the industry either as a part-time or as a whole-time worker and made their livelihood from the industry. The immense possibility of growth from the British merchant capital was only partially realized. The colonial framework of the general economy of Bengal and the different policies of the British ruler hindered the growth of the industry in fuller extent. The Economy of Bengal became a feeder economy for the industrial economy of Europe and fluctuated with all the consequences of the recurring economic ups and downs in Europe. The production of the cotton industry of the districts as well as the production of the cotton industry of Bengal became dependent on the changing needs abroad.

The sudden growth through the European merchant capital of the industry did not last for long. In the first half of the nineteenth century, the European war and the prohibitive tariff on Bengal piece-goods in England gradually reduced the European market for Bengal piece-goods. Beside these, the British Industrial Revolution made it possible for the English cotton industry to produce good quality cotton piece-goods which successfully supplanted the Bengal cotton goods from the world market. Since

then British cotton goods started to capture the world market which so long had been dominated by the cotton piece-goods of Bengal. Destitute of any patronage, the age-old glorious industry was caught in serious crisis and its products were being rapidly supplanted by the Manchester goods, and by the European, American, and Asiatic markets. The Indian markets also embraced the same fate. There are many studies on the cotton textile industry of India, and on its competition with that of European countries. Here only important studies relevant to this study particular have been reviewed.

M. P. Gandhi³ pointed out that India is the birthplace of the cotton industry. The industry was in a flourishing condition even at the time of the Rig Veda. The Mahabharata, the Ramayana and the Purans are full of references to cotton goods. He showed that around A.D.1290, cotton was produced and cotton products were manufactured in Gujrat, Cambay, Telingana, Malabar and Bengal. He also showed that during the Mughal period, cotton-weaving was one of the most extensive industries in India and it exported cloths to many countries of the world after fulfilling her domestic demand. He described that under the East India Company's trade, the chief articles of export from India were calicoes, indigo, cotton, salt-peter, spices and raw silk. He mentioned that the export trade by the East India Company created a sudden booming of the cotton industry in India. Gandhi concluded that the prohibition of Indian manufactures in England and every possible effort of the British to push the sale of British cotton goods in India caused the decline of the cotton industry of India in the nineteenth century.

K. N. Chaudhuri in his article on "The structure of Indian textile industry in the seventeenth and eighteenth centuries"⁴ has shown that before the discovery of machine spinning and weaving in the second half of the eighteenth century, India was the world's greatest producer of cotton textile. The cotton products of India

³ Gandhi, M.P., *The Indian Cotton Textile Industry: Its Past, Present and Future*.

⁴ Chaudhuri, K. N., 'The structure of Indian textile industry in the seventeenth and eighteenth centuries' *Indian Economic and Social History Review*, 1974, vol. 11, pp. 127-82.

dominated the market of Asian and African countries long before the advent of the European traders. In seventeenth and eighteenth centuries Indian cotton products flooded the European market by the European traders. Chaudhuri also unveiled that the success of the Indian cotton goods in English as well as other European markets was due to their low price and high quality. This low price of cotton goods was due to low production cost. The low cost of textile products in India was possible due to two major advantages: locally produced raw materials and human capital. The labour force of India in textile manufactures was highly skilled and this skill was transmitted from one generation to next generation naturally. He showed that there were four industrial regions in India, viz. Punjab, Gujarat, the Coromandel Coast and Bengal which were specialized in the manufacture of cotton goods for export. Chaudhuri further showed that gradually it became difficult for Indian industry with age-old simple and crude mechanical devices to maintain the competitive position, for its European rival, the English cotton industry, progressed rapidly with modern power-driven machines along with the Industrial Revolution and its concomitant technological innovation.

S. Broadberry and B. Gupta in their article titled “Cotton Textiles and the Great Divergence: Lancashire, India and Shifting Competitive Advantage, 1600-1850”⁵ has discussed the state of cotton textile industry in India and England during 1600-1850. They showed that the comparative advantage was with Indian textile industry in early period in terms of unit labour costs and highly labour intensive production methods. From the seventeenth century the Indian cotton products started flooding the market of England. At that time the cotton industry of England started to grow as an import substituting industry, as the new imported Bengal clothes and its patterns as well as designs became increasingly popular fashion in England. But due to higher wages of

⁵ Broadberry, S. & Gupta, B., ‘cotton textiles and the great divergence: Lancashire, India and shifting competitive advantage, 1600-1850’ Discussion Paper, No. 5183, Aug 2005, *Centre for Economic Policy Research, London*. pp. 1-47.

the British labour, initially the English manufacturers failed to implement the labour intensive Indian methods of production and did not find it economically viable to compete with the Bengal products. Gradually the comparative advantage shifted to England from India when the productivity increased in Britain and stagnated in India. The productivity growth in England reached a point where Britain's higher wages were such as to offset the relatively lower wage cost of Bengal thanks to technological innovation. This high productivity and low cost ensured the growing dominance of the British cotton industry in the world market. According to Broadberry and Gupta, there were three stages of the shift of the comparative advantages. The first stage occurred between 1600 and 1700. In this stage the English industry was unable to compete with India although labour productivity was higher in England than that in India. The second stage was between 1760 and 1830. During this period labour saving technological progress raised labour productivity in England to such a level that the comparative advantage shifted in favour of English industry. It successfully ousted and supplanted Indian cotton manufactures from the world market. In third stage, i.e., the period after 1830, further technological progress occurred in England, and the English cotton manufactures became competitive even in the Indian market.

Giorgio Riello⁶ made a study on the trade of Indian cotton textiles. The author's explanation exhibits how the European continent especially England had become the core of manufacturing as well as the main carrier of cotton textiles across the globe from the early nineteenth century. He showed that Europe did not suddenly acquire the skills, knowledge and outlook to produce and market cotton manufactures. It was not the simple result of technological innovation but was a long process of learning from India since 1500s, and it took a couple of centuries. He argued that the

⁶ Riello, G. and Roy, T. (ed.), *How India Clothed the World*, Chap, 11: The Indian Apprenticeship: The Trade of Indian Textiles and the Making of European Cottons, Riello, G., pp. 309-346.

international trade of cotton textiles was the key to creating the conditions for the development of the European cotton textile industry.

Riello showed that before the opening up of trade between India and Europe, the European had no useful knowledge of spinning, weaving or printing of cloths and had little consumer experience with cottons. When Indian cotton products flooded in the European market, Europe started to develop its cotton manufacturing and trade. The European cotton industry gathered knowledge regarding products through the import of Indian textiles by the European Merchant companies like the Dutch Verenigde Oostindische Compagnie (V O C) and the English East India Company (EIC).

Riello concluded that it was a long process of learning knowledge by the Europeans about cotton textiles as commodities and become a carrier of technologies and taste and the history of development of the European cotton industry was a history of long 'Indian apprenticeship' for Europe.

Prasannan Parthasarathi's study, "The European Response to Indian Cottons",⁷ reveals that from the mid-seventeenth century the people of Europe preferred the Indian cotton products for their beauty, convenience and low price. The European textile manufacturers had less support on the influx of Indian cotton goods into their market as it was a threat to their livelihoods. From the late seventeenth century, the European manufacturers gave opposition to Indian cloth imports but at the same time they put effort to imitate them. In different parts of Europe many shops were set up for printing on the Indian white plain calicoes. In the eighteenth century, cotton printing works proliferated across many towns and cities across the continent. Parthasarathi revealed that starting with imitation in the seventeenth century, within less than two hundred years later and certainly by 1850, the Western Europe especially England appeared as the most important centre of the world cotton

⁷ Parthasarathi, P., *Why Europe Grew Rich and Asia Did Not: Global Economic Divergence, 1600-1850*, Chap. 4: The European Response to Indian cottons, pp. 89-114.

manufacturing. Since then, Indian subcontinent was displaced as the major supplier of cotton textiles to the world market.

M. Berg⁸ made a study on global demand for luxury and quality cotton textiles. He argued that some silk and cotton luxury goods were imported from India and other Asian countries to Europe during the medieval period, but import was very insignificant, and these expensive luxury goods were used only by the affluent section of the European society. He argued that Indian luxury cotton goods got a growing and broader consumer market since the seventeenth century when the Dutch and British East India Companies imported larger quantities of Asian textiles. Since then the growing popularity of the Indian luxury cotton goods encouraged the European trading companies to order cotton goods in India, especially designed for the European market.

Berg showed that from the beginning of the seventeenth century, the English entrepreneurs started to develop their own cotton industry and the British government supported them with encouragement. He concluded that in eighteenth century, tariff protection to the cotton industry and growing world demand for cotton goods encouraged technological innovations in Britain. Thus by the late eighteenth century, Britain become the world leader in cotton textile production and her cotton industry propelled the industrial revolution substantially.

Amalendu Guha made an attempt to estimate the total acreage under raw cotton and the total output of cotton lint in western India around the year 1850 in his article, "Raw Cotton of Western India: 1750-1850"⁹. He described the developments in transportation and marketing of western Indian raw cotton during the period of 1750-1850. His study area covered the present states of Maharashtra, Gujrat and the Old

⁸ Riello, G. and Roy, T. (ed.), *How India Clothed the World*, Chap, 14: Quality, Cotton and the Global luxury trade, by Berg, M., pp. 391-414.

⁹ Guha, A., 'Raw Cotton of Western India: Output, Transportation and Marketing 1750-1850', *Indian Economic and Social History Review*, 1972, vol. 9, pp. 1-41.

Bombay presidency of 1930, excluding the district of North Canara. He also showed that prior to 1770, the raw cotton of Gujrat was supplied to Sind, Madras and Bengal for local consumption via sea route. But the sea trade gradually decreased and completely ceased by 1785. From 1770, Gujrat started to export her raw cotton to China and United Kingdom. In January 1785, around 16,000 to 20,000 bales of raw cotton were exported to China. Guha concluded that the main cause of the export of western cotton was the decline of India's domestic raw cotton consumption which occurred due to the decline of her cotton spinning and weaving industry.

D. Washbrook's study, "The textile Industry and the Economy of South India 1500-1800"¹⁰, deals with the principal weaving centres situated in north and central Coromandal. The author maintains that between sixteenth and eighteenth centuries, the cotton textiles of India had become the centre of attraction to the then emerging world of trade, although these were the principal items of ocean commerce long before the sixteenth century. He shows that since the sixteenth century, the demand for Indian textiles expanded to the European market which had been hitherto confined mostly in the Asian market. He maintains that the finest cotton goods were woven in villages in different parts of India, as in Bengal where the raw cotton used to come from long distance mostly through the sea route. Washbrook argues that in South India, the principal centres of the production of fine textiles in the medieval period lay in the environs of the major temples. Here the rules and regulations for the weavers were maintained by the temples. He says that since the sixteenth century, a progressive shift occurred in production when the weavers started to settle towards the coastal area to access the European merchant traders. By the latter half of the seventeenth century, these coastal settlements dominated the production of fine cotton textiles. He further shows that the shifting of the weavers from the temple environs to the coastal areas was not forced. Rather they shifted on their own volition to earn

¹⁰ Riello, G. and Roy, T. (ed.), *How India Clothed the World*, Chap,6: The Textile and the Economy of South India 1500-1800, by Washbrook, D., pp. 173-192.

higher wages from merchant companies and to get freedom, both economically as well as socially. Washbrook concludes that the cotton industry of India especially in south India grew rapidly due to overseas market till the first decade of the nineteenth century. Since the abolition of the monopoly of the English Company in trade in India in 1813 to the last quarter of the nineteenth century the performance of the industry reveals a decaying, waning phase.

L. Subramaniam in his article, "The Political Economy of Textiles in Western India: Weavers, Merchants and the Transition to a Colonial Economy"¹¹, makes an attempt to analyze the structure of the textile business in the late eighteenth century of Western India especially in Surat and South Gujrat. He explains the responses of merchants and manufacturers in terms of the introduction of the East India Company rule, and shows the changes in their responses from pre-colonial to early colonial state. Subramaniam argues that a miscellany of castes and communities like Hindu, Muslim and Parsi were engaged in textile manufactures, and one community used to produce some variety of clothes which others did not. His article reveals that among the Muslim castes, the Momnas, Boras and Bhandarrahs were engaged in the production of coarse clothes for domestic use as well as the production of clothes with gold embroidery or zari. The Khattris, a Hindu weaving caste, were engaged in the manufacture of fine piece-goods. Subramaniam gives an account of the linkages between political power, ritual status and commercial developments which configured the structure of the manufacturing sector and the strategies of the merchants as well as the manufacturers during the century of transition to colonial rule. In the pre-colonial period the weavers were not in a very advantageous position, but they enjoyed more freedom in their works. In the colonial period the merchants and brokers had been able to resist the attempts of the English Company to introduce structural changes in

¹¹ Riello, G. and Roy, T. (ed.), *How India Clothed the World*, Chap,9: The Political Economy of Textiles in Western India: Weavers, Merchants and the transition to a Colonial Economy by Subramanian, L., pp. 253-280.

the procurement process and commerce only for some time. Subramaniam concludes that in the colonial period, the political insecurity after the decline of the Mughal, paucity of money, rising prices of yarn and the hegemony of the English Company were the major causes behind the business failures, resistance and desertion by the weavers.

Joseph J. Brenning made a study on "Textile Producers and Production in Late Seventeenth Century Coromandal"¹². His study areas were the Godavari and the Krishna deltas of Northern Coromandel. In his review, it was shown that among the European traders the Dutch were seeking ways to gain control over their suppliers, the brokers and the weavers. In late seventeenth century, after supplying stable markets in Southeast Asia the cotton industry of Coromandal found a new market for its calicoes in Europe through the European traders. Brenning shows that the Northern Coromandal was famous for checked rumalls, chints and many painted cloths. Beside these, two types of plain clothes, namely muslins and calicoes of Northern Coromandal were exported by the European traders like the Dutch, the English and the Portuguese. The Northern Coromandal was unsuitable for cotton production, and so its cotton industry collected its raw cotton from outside, and mainly from Decan. Here the Banjara, a nomadic tribe, used to supply the Decan cotton by their caravan bullocks. He also mentions that the Banjara trade in Decan cotton was considerable for long-distance overland trade which gave necessary supply of cotton to cotton industry in pre-colonial and even in the early colonial period. Brenning also reveals that a large number of people were engaged in weaving in the cotton industry of Coromandal in the seventeenth century. About 5,960 households and 7,530 looms were engaged in the production of cotton goods. Weaving was a full-time occupation and was restricted to the male members of the household. The weavers had little or no opportunity to earn a supplementary income

¹² Brenning, J. Joseph, 'Textile producers and production in late seventeenth century Coromandal', *The Indian Economic and Social History Review*, 1986, vol. 23, pp. 333-55.

during the weaving season. Brenning concludes that calicoes industry of the Northern Coromandal was an integral part of a local domestic economy, and that despite the importance of the export sector, it was dependent on domestic demand. Due to European Companies trade the capacity of production and thereby employment in the cotton industry in the Northern Coromandal increased to a great extent. The trade by the European Companies gave less than 50 percent of the total employment in this area. Further, he mentions that the weavers were in the central position in the complex inter-relationships between the groups involved in the textile export industry and they had been able to protect themselves from the consequences of the dependence on the European merchant capital in the late seventeenth century.

R. Dutt¹³ points out that India was an agricultural as well as a great manufacturing country down to the first decade of the nineteenth century. A large portion of the Indian population was engaged in various industries. Spinning and weaving were the national industry of the people and millions of women used to support their family by their earnings from spinning. Dutt shows that a large quantity of cotton goods of India was exported to England alone till the early nineteenth century. In value term it was £ 7,317 in 1799, £ 27,876 in 1803, £ 118,408 in 1809 and £ 108,824 in 1813. He also shows that since 1790, India started exporting cotton to England. Since then, the cotton export gradually increased. In 1827, the export of Indian cotton reached to 68 million lbs. Dutt further shows that in 1813 cotton goods of India were sold in the English market at a price which was 50 to 60 per cent lower than the goods produced in England. To protect the English infant cotton industry the British parliament imposed duties of 70 and 80 percent on the value of Indian goods and prohibited the entry of some types of Indian cotton goods into the English market. In spite of the prohibitions and the restrictive duties till the early years of the nineteenth century, a considerable quantity of Indian cotton piece-goods was imported in England. This trend drastically fell down since 1813. In 1813 the monopoly of the East India

¹³ Dutt, R., *The Economic History of India*, Chap. 14, 15 & 16.

Company in Eastern trade was abolished, and was exposed to private merchants. The trade of the East India Company gradually diminished and abolished altogether in 1833. Through the private trade, the export increased temporarily in 1815, but declined in the following years. After 1820, a steady decline was seen in both production and export of Indian cotton piece-goods to England and other countries. After 1820 India witnessed a miserable plight in her cotton industry, and started to import British and other foreign piece-goods. Dutt concludes that the hostile British policy gradually replaced the Indian goods by the British manufactures, not only in the world market but also in the home market of India. Thus the selfish commercial policy of United Kingdom made India the producer and supplier of raw cotton for the looms and manufactories of Great Britain by the first decade of nineteenth century.

There are some studies which discuss about the cotton textile industry of Bengal. For example, N.K. Sinha¹⁴ made the pioneering work on the Economic History of Bengal. His study reveals that during eighteenth century, the cotton weavers were the most important among all the manufacturers in the economy of Bengal. He takes into account the cotton industry of Bengal during 1757 to 1848 when it was a rural domestic handicraft industry. Sinha shows that since the early eighteenth century, the weavers gradually became dependent on European merchant capital, and after 1757 the cotton piece-goods production had become dependent mostly on the investment of the English East India Company. The weavers who took advances from the English Company were bound to produce only for the Company. At that time, the weavers had to face much oppression, restrictions, limitations and prohibitions which were imposed by the English Company. The servants of the Company executed oppression on the weavers. The weavers were completely free and faced less oppression before Plassey. Sinha further describes the secret of the success of the weavers of Bengal. The weavers of Bengal used to manufacture many kinds of clothes like *mulmul*, *tanjib*, *abroan*, *sarbati*, etc. He showed that different places of Bengal were

¹⁴ Sinha, N. K., *The Economic History of Bengal*, vol. I, chap. 1-9 & vol. III, chap. 1-3.

specialized for the production of different varieties of cotton clothes. The weavers of Bengal were indigent, industrious, and skilful, and endowed with a fine sensibility of touch, a nice perception of weight and singular command of muscular action. All these qualities enabled them to produce such fine clothes which were a mystery to the world. Sinha's study exhibits that weaving was confined to a particular caste of the society. Spinning was not a professed trade, but was done by the women of all castes of the society. The women used to spin when they were free from their household works.

According to Sinha, the decline of the Bengal cotton industry started considerably since 1793. Since then, the investment for cotton piece-goods of Bengal by the English Company started to decline considerably. He found that by the first decade of the nineteenth century the Bengal cotton goods had disappeared from the investment list of the English Company and the private trade of Bengal cotton goods followed the similar trend. Due to this disinvestment by 1828 about 10,00,000 people had lost their employment in the cotton industry of Bengal. The author also shows that the export of Bengal cotton textile started to decline steadily from the turn of the eighteenth century. Sinha concludes that since the early nineteenth century the machine made cotton goods of England had been able to replace the Bengal piece-goods from the world market as well as from the home market of India. Sinha further concludes that the hostile British policy helped to kill the Bengal industry more speedily and effectively than the competition of cheap British goods alone would have done.

Hameeda Hossain¹⁵ gives a good account of the cotton weavers of Bengal under the Company's rule during 1750-1813. The author mentions that two important features of the Bengal cotton products were its high quality and low cost. These features resulted from the very simple technique with extreme specialization of function. Here the requirements of capital were minimal. Hossain finds that the production system was highly labour-intensive and caste-biased. The weaving was confined to some

¹⁵ Hossain, H., *The Company Weavers of Bengal*.

particular castes of Hindu and a specific section of the Muslim community. The author also shows that people belonging to some castes would become weavers at the risk of being outcaste in the eyes of the society. The weavers, who worked under the English East India Company, were hailed as 'Company weavers'. The Company maintained strict control over them. There was no caste bias in spinning. It was a part-time domestic job which was carried on by women. Other than spinning, the weaving, washing and bleaching were done directly under the control and supervision of the English East India Company. Hossain points out that various coarse and fine variety of cloths were produced in Bengal. The coarse varieties were used mainly for domestic consumption. The superfine luxury clothes were used by the Mughal Emperors, provincial rulers and their noble court. Usually standardized, medium and luxury varieties were exported. Hossain maintains that the English Company set up many *aurangs* or the central collection centres in each weaving region where cotton products could be easily procured. The Company established nineteen main *aurungs* or commercial residencies. The English Company was able to exercise greater control over the weavers than other European companies because it acquired political power in and territorial control over Bengal. Although a commercial resident was appointed in each *aurung* for the supervision of collections, the export warehouse keepers also checked the cotton products sent from the *aurung* and rejected some goods due to its inferior quality. Hossain also points out that the policy of the English Company was to maximize profit from the export of the Bengal cotton textiles. The Company did not foster the Bengal industry. They always fixed the procurement price at low level to maximize profit. Rather than providing incentives for higher productivity, the Company was interested to maintain high profit margin. The procurement price was determined at the time of placing order to the weavers. If the price index of essential commodities such as rice, salt, oil and raw cotton had risen in the period between the date of order and the date of supply of clothes, no allowance was paid to the weavers during the intervening period. The procurement price began to look up when the price of raw cotton increased. But the rate of increase in procurement price was proportionately less if the escalation of the price of raw cotton is taken into

consideration. The weavers started to take order from the private traders apart from the order received from the Company. Sometimes the weavers utilized the Company's advances to finance production for the private traders. Some weavers who wove coarse clothes shifted from the production for the Company to the production for the domestic market. Some of them carried on weaving along with agriculture. As a result of all these, the Company would not be able to procure goods on time, and both quantity and quality of cotton products reduced. Hossain concludes that the conflicting pulls to maintain the price level on the one hand, and to obtain subsistence wages on the other, made the procurement of cotton goods gradually difficult for the Company from the early nineteenth century. The author also concludes that in those days the cotton industry of Bengal started to decline due to two factors namely the Company's attempt to pay lower price to the weavers and the imposition of strict control over the weavers. Both of these factors caused large exodus of weavers from the industry.

J.G. Medlicott¹⁶ gives a brief account of the Indian cotton trade with England during 1793-1857 along with a district-wise description of raw cotton in Bengal province during the middle of eighteenth to the middle of the nineteenth century. Medlicott shows that the export of Indian cotton to England started in 1783 when 114,133 lbs were exported. In the year 1818 India and America entered into competition for possession of the English market. In that year the import of Indian cotton was 247,000 lbs, as against 207,000 lbs of American. In 1857, the import of Indian cotton into the English market was 28,000,000 lbs. The author provides a description of the state of Indian cotton trade, its prospects and difficulties which impeded its growth. Medlicott shows in his study that since the end of the eighteenth century Bengal cotton was exported to many countries of the world. The amount of export was 40,661 maunds during 1796-1805, 349,305 maunds during 1816-1825 and 169,602 maunds in 1845-1854. Medlicott presents a detailed account of the cotton production in every district of Bengal. He takes into account the following various parameters to

¹⁶ Medlicott, J.G., *Cotton-handbook for Bengal*.

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furnish his information on raw cotton production: (a.) structure of soil and its capability of production; (b.) varieties of cotton produced; (c.) yield per acre; (d.) total area of land used for cotton production; (e.) price of cotton in district bazaar and in principal marts; and (f.) area of land which could be added in cotton production. Medicott concludes that in Bengal, cotton used to be cultivated badly, picked carelessly and wasted at the time of cleaning. Beside these, at the time of trade, the quality of cotton used to get deteriorated due to mishandling.

An account of trade of Bengal cotton textiles during sixteenth century is found in Sanjoy Subrahmanyum's article on "Notes on the Sixteenth Century Bengal trade"¹⁷. He has studied on the Bengal trade to unravel the enigma of Bengal in sixteenth century Asian trade. On the basis of Portuguese sources, Subrahmanyum's study shows that during the sixteenth century, Bengal was a major exporter of cotton textiles to many regions of Asia when a great part of the Bengal trade and shipping were in the hands of the Portuguese. Bengal cotton textiles were exported to such countries as Malaka, Sri Lanka, Malabar and Maldives. Subrahmanyum describes that raw cotton was imported to Bengal from Gujrat since 1500. The Bengal cotton goods were exported to western India through the Portuguese private traders. The Portuguese private traders used to purchase Bengal cotton textiles. Some of those textiles were consumed in western India, but a large portion went on to the Middle East. Since the end of the sixteenth century the export of Bengal cotton goods by the Portuguese started and increased gradually thereafter. Subrahmanyum concludes that in sixteenth century, the textile trade in Bengal was dominated by the Portuguese, and that the Dutch and the English traders started to give attention to Bengal textile trade since the beginning of the second half of the seventeenth century.

¹⁷ Subrahmanyam, S., 'Notes on the sixteenth century Bengal trade', *Indian Economic and Social History Review*, 1987, vol. 24, pp. 265-89.

Om Prakash¹⁸ describes that Bengal was a region of major textile production, and also famous for the production of luxury cotton clothes from a very early age. But, before the advent of the European traders in India, the export of Bengal clothes was insignificant in ocean trade. When the European markets opened, they were flooded with and dominated by the cotton textiles woven in Bengal. At the beginning of the eighteenth century, as much as 40 percent of export to Europe from Asia by the Dutch and English East India Company was initiated from Bengal. A substantial portion of that export comprised Bengal textiles and raw silk. Prakash also points out that the European Companies procured cotton, silk and mixed textiles from Bengal. The cotton textiles of Bengal, both muslin and fine calicoes, were procured by the companies. The author gives an account of the volume and value of textiles which were procured by the European companies for export, the process of production and finally, the system of procurement. Prakash further discusses that before 1757, the weavers independently took decisions about production and a certain portion of production was carried on by the weavers' own resources and at their own risk. The bulk of output, however, was manufactured on the basis of agreement between the bulk purchasers called merchants or *paikars* and the weavers about the quality of output, the price and the date of delivery. A part of the final value of contract was given to the weavers in advance. Prior to 1757 both the merchants and weavers enjoyed freedom to decide with whom to carry on business and on what terms. The author shows that the freedom gradually became on the wane after the Battle of Plassey in 1757. In the post-battle period, the English East India Company started to control the larger portion of the textile business in Bengal outmanoeuvring other European rivals. Gradually, larger and larger sections of the weavers and *paikers* were forced to work for the English Company only under the terms and conditions substantially lower than the contemporary market rate. This was nothing but the exploitation of the English Company which then had a politically advantageous

¹⁸ Riello, G. and Roy, T. (ed.), *How India Clothed the World*, Chap, 8: From market-determined to coercion-based: Textile manufacturing in Eighteenth century Bengal, by Prakash, Om, pp. 217-52.

position in the province of Bengal. Besides, the English Company used to grade the products by different categories and offered different prices for different products. Here the author mentions that the cotton goods classified as third grade and procured at a very low price by the English Company was easily accepted by the Dutch Company as first grade quality. It was another mode of exploitation by the British. Sometimes the English Company rejected some cotton products as 'firty'(damaged) which actually had a profitable market price. The profit from the sale of those goods was shared clandestinely between the Commercial Resident, the chief *gomastas* and the *paikers*. This was another example of exploitation to which the weavers were vulnerable. Prakash concludes that the British rule in Bengal replaced the market-determined system of textile production with the procurement through coercion in the province. He further concludes that in the post-Plassey period, the share of the artisans and *paikers* in the market value of output had been reduced substantially and the large share was appropriated by the procurer i.e.; the English Company.

James Taylor¹⁹ maintains that weaving, embroidering and bleaching were the principal arts of the district of Dhaka since very early period till the end of the eighteenth century. Dhaka was famous from very ancient time for its fine muslins. These muslins were highly appreciated in the European country since the first century of the Christian era. The ladies of the imperial Rome used to offer high price for the Dacca muslins. Taylor mentions that the Dhaka muslins were extraordinarily fine, transparent and soft which could be drawn through a ring of middling size. The Mughal Emperors were the patronage of the Dhaka muslins and they greatly encouraged its production. Taylor shows that till the time when the great perfection in the art of weaving had arrived in Britain, the Dhaka muslins were unrivalled, and it successfully excluded the cotton textiles of the other countries in the world market due to its transparency, beauty and delicacy of texture. Taylor further points out that all the fine muslins of Dhaka were produced by the indigenous cotton of the district.

¹⁹ Taylor, J., *A Sketch of the Topography and Statistics of Dacca*, Chap. 6.

The raw cotton was imported in the district from different parts of India, but the threads from that cotton were used for the production of inferior quality cotton piece-goods. The import of cotton had diminished greatly due to influx of British yarn into the district since 1787. Taylor also mentions that very simple instruments were used in each stage of production. The women used to clean the cotton and spin the thread. The *cherkee* and *dullun cathee* were used to clean cotton, the dried jaw bone of Boali fish was used for carding, a small bow made of bamboo was used for teasing and *Chwkhee* or spindle was used for spinning. Weaving was done under the roof of the weavers' own house or under a shed raised for the purpose. The instruments used by the weavers were all made by small pieces of bamboo. The author shows that the rainy season was most favourable for weaving the fine muslins. The fine muslins were produced by the Hindu weavers but flowered muslins or *jamdanees* were produced by the Mussulman weavers. The coarser clothes were manufactured by the *Joogees* (lower caste Hindu) and the *Joolahs* (a section of the Muslim community). The art of embroidering on the clothes was extensively practiced in Dhaka. The Muslims were engaged in this profession who used needles for the purpose. The bleaching of clothes was confined to the northern division of the Dhaka district.

Taylor also reveals that the spinning branch of the Dhaka cotton industry began to be affected in 1824, when a considerable amount of English machine-made yarn was imported into Dhaka. Since then, the cotton weavers of Dhaka started to use English yarn extensively. Thus the spinning branch of the Dhaka industry had been ruined by 1828. Taylor further describes that the Dhaka cotton industry received its most severe shock in 1785, when 50,000 pieces of muslins were produced in England by mule twist. Since then, the muslins production grew rapidly through mechanical inventions and 75 percent tariff protection. Thus the export of Dhaka muslins to England steadily declined since the turn of the eighteenth century. The export was 30 lacs of rupee in value term in 1787; in 1813 it became 3.5 lacs and in 1817 it altogether ceased. In 1817, the Commercial Residency of Dhaka was abolished. In 1825, the duty on Indian goods in England was reduced to 10 percent *ad valorem*. But after the reduction of duty the Dhaka cotton industry was not able to revive. Taylor concludes

that since 1824, the large influx of English twist caused the total exclusion of country threads. In this way the spinning industry of Dhaka had been ruined. He further concludes that the loss of English market on the one hand and the production of good quality muslins in England with its high acceptability in the world market on the other hand, caused the destruction of the world famous cotton industry of Dhaka.

Indrajit Ray²⁰ in his research paper entitled “Identifying the Woes of the Cotton Textile Industry in Bengal: Tales of the Nineteenth Century” critically explains the decay of the Bengal cotton textile industry which occurred in nineteenth century. He has identified the exact period of the decline of the industries and explained the reasons behind the decline. He challenges the earlier hypothesis which showed that the decline of the industry started considerably at the end of the eighteenth century or at the beginning of the nineteenth century. Ray’s paper does not support the reasons like Britain’s discriminatory tariff policy and the loss of English market behind the decay of the Bengal industry. He shows that by 1826 technological innovations in Great Britain made it possible for the English machine-made cotton piece-goods to excel in such a quality as to successfully capture the world market as well as the market of India. According to him, the spread of weaving machinery since 1830s and its improvement by 1940s in England caused catastrophes to the Bengal industry. Ray concludes that the phase of perpetual decline of the Bengal cotton industry started in the mid 1820s. Since then the pace of decline was slow but steady. The industry had reached a gloomy state by 1860 when nearly 5,63,000 workers lost their jobs. He further concludes that the technological innovation in England was the main cause behind the decline of the Bengal cotton industry during the fast half of the nineteenth century.

From the above study of existing literatures we find that a large volume of studies have their focus on two production centres in the global context, with Bengal at one end and England at the other. This is mainly due to the fact that the Industrial

²⁰ Ray, I., ‘Identifying the woes of the cotton textile industry in Bengal: tales of the nineteenth century’, *The Indian Economic History Review*, Vol.62, issue 4, pp. 857-892.

Revolution in the latter progressed under severe competition from Bengal artisans. The thrust area of those studies is to identify when and how technological innovations in Great Britain could gain supremacy over Bengal. They have generally made use of available import-export statistics to show that how England won over Bengal competitive edge by the turn of the eighteenth century. They showed that the cotton textile industry of Bengal started declining rapidly from the eve of the nineteenth century. One of the major lacunas is, however, that production-centric approach is almost entirely absent there. In addition to these, there is no literature which gives us the district-wise status of the industry and the exact period as well as the precise reason(s) behind the decay of the industry in a particular district. We only get the description of the industry in Dacca district from the writing of Taylor. So far there is no literary study on the account of the industry in three districts of Bengal viz. Birbhum, Burdwan and Hooghly during 1757-1857.

Thus we find the following research gaps in the existing literatures:

- i) the production centric approach is almost absent.
- ii) no literature reviews the status of the industry in the districts of Birbhum, Burdwan and Hooghly.
- iii) the existing literatures show the commencing period from the view point of the Bengal as a whole. They did not try to identify the period for a particular district. There is every possibility that the period of decline of Dhaka industry and the period of decline of Birbhum industry differ.
- iv) the existing literatures identify the reasons behind the decline of the industry from the view point of the Bengal as whole. But the reasons may be different for different districts. The reasons for the decay of the Dhaka industry may not be the same for the industry in Burdwan, and so and so forth.

II

Here we discuss the chapterisation of the study, the research questions and the methodological issues.

Chapterisation:

In addition to this introductory chapter, there are six chapters in the dissertation, which are as follows.

Chapter II: Bengal's Cotton Textile Industry Prior to 1757: A Bird's Eye View.

Chapter III: Techno-economic Environment for the Industry: A Comparative Analysis between Great Britain and Bengal.

Chapter IV: Status of the Industry in Birbhum, Burdwan and Hooghly during 1757 – 1857.

Chapter V: Onset of the Industry's Decline: Identification of the Period.

Chapter VI: Onset of the Industry's Decline: Identification of its Reasons.

Chapter VII: Summary of Observations and Conclusions.

I wish to briefly discuss the contents of each chapter below:

Chapter II considers the various aspects of the traditional cotton industry of Bengal prior to 1757. It discusses the historical evidences of the cotton textile industry of Bengal. It explores the trade of Bengal piece-goods in different parts of the World prior to 1757. It shows the prices of various cotton piece-goods of Bengal prior to 1757. It analyses the production organization of the industry in the said period. It also gives an idea about the production and import of raw cotton in Bengal looms.

Chapter III discusses the technological and economic aspects of the cotton industry of the two production centres of the World, Bengal and England, and identifies the factor(s) behind the victory of the English industry over the Bengal industry in the

World market in the first half of the nineteenth century. It compares the technology of production in both centres, the labour cost of production between the two centres and the position of the two centres in respect of the availability of raw cotton during 1757 -1857. It also discusses the economic environment of the two countries that affected the growth of the industry in both the countries.

Chapter IV analyses the various aspects of the cotton industry in three districts of Bengal namely, Birbhum, Burdwan and Hooghly during 1757 -1857. It discusses the different production centres of the districts where the cotton industry was concentrated. The organization of the production will be explained here. This chapter also highlights various aspects of the districts' industry like the numbers of people employed in the industry and their income, the availability of raw cotton for the industry, the cost of production and the price of the products of the districts.

Chapter V identifies the period in which the decline of the cotton industry in three districts, commenced. It identifies the period of decline on the basis of the following aspects like the size of population which was engaged in the districts' industry, the decline of the consumption of raw cotton by the districts' industry, the decline of the investment in the districts' industry by the English East India Company and some contemporary evidences which confirm the decline.

Chapter VI identifies the reasons behind the decline of the cotton industry in the three districts. This chapter considers the following reasons behind the decline of the cotton textile industry of Bengal. The reasons were the industrial revolution or technological innovation in England, hostile British policy, i.e. stringent tariff on Bengal goods in England, and the oppressive measures on the Bengal weavers by the British and the loss of market after the fall of royal courts. This chapter analyses the validity of the above mentioned factors claimed to be responsible for the decline of the districts' cotton industry and identify the actual reason(s) behind the decay.

Chapter VII sums up the major findings and conclusions.

Research Questions:

The following research questions will be addressed in this thesis:

1. What was the status of the industry in Birbhum, Burdwan and Hooghly districts during 1757 – 1857 in respect of employment, consumption of raw materials, local consumption of finished goods and exports?
2. When did the industry start declining in those districts? and
3. What were the causal factors behind the demise of the industry?

Methodology:

This study is primarily based on archival materials. Secondary sources have been consulted to accommodate available views and opinions from the existing literatures. The documents that have been extensively used here are the British Parliamentary Papers, both House of Commons and House of Lords (various issues), Proceedings of the Board of Trade Commercials (various issues), Proceedings of the Board of Revenue (various issues), Proceedings of the Board of Customs (various issues), the imperial gazetteers (different volumes), the district gazetteers of various districts of Bengal, etc. The cross verification of the data and information from different sources has been made to ensure their reliability.

This study evaluates the status of the industry on the basis of the level of employment and its export performance, since data relating to the number of units in this industry are not available because of its cottage system of production. The lack of data regarding the number of units also compels us to identify the commencing period of the industry's decline in the districts on the basis of consumption of raw cotton by the industry and marketability of its product both in the domestic and in the world market.

Chapter - II

Chapter - II

Bengal's Cotton Textile Industry Prior to 1757: A Bird's Eye View

Cotton industry was a rural cottage handicraft industry of Bengal functioning from the days of antiquity. Bengal was famous all over the world for its production of exquisitely beautiful cotton fabrics. Various kinds of cloths were manufactured by the weavers of Bengal which were differentiated by various names according to the fabrics and places where they were made. The cotton products of Bengal can be divided into two broad categories as muslin and calicos.

This chapter analyses the status of the cotton textile industry of Bengal prior to 1757. It considers various aspects of this traditional industry during the period on the basis of historical evidences, export of industry's output, import of raw cotton for industry's consumption and its production organization. From the careful investigation on the basis of evidences and data, this chapter suggests that the growth of the industry was conspicuous in the said period. The ample demand from the Mughal Emperors and their provincial rulers coupled with the export demand by the European merchant companies since the early seventeenth century created sufficient growth impetus to the Bengal industry. Bengal calicoes were in great demand for the mass market while its muslins attained high appreciation from the affluent society of the European continent. The large influx of Bengal cotton products into England was a threat to the survival of the British cotton industry. This chapter argues that before the advent of machine spinning and weaving Bengal was probably the world's most famous producer of cotton textile.

Section I discusses the historical evidences of the cotton textile industry of Bengal. Section II explores the trade of Bengal cotton products in different parts of Asia and Europe in the period under review. Section III analyses the production organization of the industry in the period. Section IV shows the production and import of raw cotton in Bengal looms along with the prices of various cotton products of Bengal. Section V is a concluding part over viewing all the aspects discussed here.

I

From the hoary past man has been using various fibres like flax, wool, silk, hemp and cotton for producing cloth. Of these, cotton fibre is the most universally used from the early days of civilization to the present day. It is believed that cotton fibre has been used by the Indian Hindus for making cloths for no less than 4000 years. The term *Kapas* (cotton) is probably derived from the Sanskrit word *Carpasa*. It is said that from 1500 B.C. to 16th century, India was the hub of the cotton industry, and she supplied cloths to Europe for ages. The West learned spinning and weaving from India. Dr. Forbes Royle said that the cotton manufacture was undoubtedly established in India long before we get it noticed in any reliable historical source.²¹ In the *Institutions of Manu* written in about 800 B.C. it is decreed that the sacred thread of a Brahman must be of *carpasa* (cotton) only.

The first definite mention of Bengal Cloth was in the valuable record of ancient Indian commerce "The Periplus of the Erythrean Sea".²² (60 AD). From this record, it appears that fine muslins were produced at many parts in north-western India but it stood nowhere in terms of quality with regard to those produced in Bengal. It also appears from the record that a whole piece of the finest Indian muslin of 20 yards long and 1 yard wide could be passed through an ordinary finger ring. In 10th century A.D, Ibn Khurdaba, an Arab geographer, described the production of cotton clothes in

²¹ Royle, *On the culture and Commerce of Cotton in India and Elsewhere*, p.4.

²² Schoff, W. H., *The Periplus of the Erithrean Sea Travel and Trade in the Indian Ocean By a Merchant of the First Century*, P. 258.

Rahmi (a place near Dhaka).²³ Chao-Ju-Kua, a Chinese traveler in the first decade of thirteenth century, mentioned that in Ping-Kalo (Bengal) superior double edge sword-blades, cotton and other clothes were produced.²⁴

In the Mughal period, the cotton industry of Bengal was in flourishing condition which was mentioned in various literatures. Robert Orme described that the cotton manufacture of Bengal was almost as a national industry. He noted that it was difficult to find a village in Bengal where almost every man, woman or child was not employed in making a piece of cloth.²⁵ The muslins of Dhaka, especially those produced for the Emperors and his seraglio, were wonderful due to their fineness. The price of such muslins was higher at least ten times than the price of any cloth made for the Europeans or anyone else in India. The excellent quality of the Dacca muslin can be understood from the story of Aurangzeb's daughter. The Emperor wrongly considered his daughter as naked when she had draped no less than seven folds of this cloth around her body.²⁶

Pyrard de Laval travelled in Bengal in the first decade of the seventeenth century when the trade of Bengal was dominated by the Portuguese and said, that the inhabitants of Bengal, both men and women, are wondrously adroit in all such manufactures such as of cotton, cloth and silks and needlework, such as embroideries which are worked so skillfully, down to the smallest stitches that nothing prettier was to be seen anywhere. Some of these cottons and silks were so fine that it was difficult to say whether a person so attired be clothed or nude.²⁷

²³ Dowson, J. ed., *The History of India As Told By Its Own Historians*, vol.1, p. 13-14.

²⁴ Hirth, F, 'An article on Chao-ju-Kua's ethnography, etc.', *J.R.S.A*, 1806, p.495.

²⁵ Orme, R., *Historical Fragments of the Mogul Empire*, p.409.

²⁶ Bolts, William, *Considerations*, p. 206.

²⁷ Gray, A., *The Voyage of Francois Pyrard of Laval etc.* vol I, p.329.

Ralph Fitch during his travel in India in 1583 found production and trade of cotton and cotton cloth in many places of Bengal namely Gaur, Saptagram and Sonargaon. Sonargaon, a village near Dhaka, was described by Ralph Fitch as the place that produced the best and finest quality of cotton cloth in all over India.²⁸ It is mentioned in the *Ain-i-Akbari* that in Sonargaon, a large quantity of a very fine muslin was manufactured.²⁹

Moreland, while describing the cotton manufactures of Bengal, observed that the people of Bengal during this period (1600 A.D) used to wear clothes made of either jute or cotton, and that the province was so densely populated that its clothing must indicate a substantial proportion of the entire textile consumption of the country.³⁰

In the first half of the eighteenth century, the Bengal cotton textile industry was flourishing through internal and external trade by the indigenous and European merchants and through the patronage of the Mughal Emperors and the Provincial rulers like the *Nawabs* of Bengal. It was described in the writing of Bolts and Orme who were two contemporary observers. William Bolt's description is very significant in this regard. He says that every possible encouragement was given by the Mughals to the merchants of all nations who were allowed free ingress and egress for their traffic to and from Bengal by land and water, in so much that large caravans overland were used to come from the distant parts even from Muscovy for the purposes of trade into Bengal and the adjacent provinces.³¹ The description presented by Orme on the same topic states that Bengal by its situation and production had the most extensive commerce of any province of the Empire. Delhi was from thence supplied with all its linens and silks, raw and manufactured, with cloths, with sugar, opium,

²⁸ Foster, W., ed., *Early Travels In India*, 1583-1619, p. 24-28.

²⁹ Jarrett, ed., *Ain-I -Akbari*, Vol.II, p.124.

³⁰ Moreland, *India at the death of Akbar*, p.179.

³¹ Bolts, op, cit., p.67.

grain etc. The European nations made their largest and most valuable investments there.³²

During 1739-1759, the Mughal Empire fell but the luxurious mode of living of the Emperors and his noble court continued. Besides this, there were the *Nawab Wazir* of Oudh, the petty Ruhela Chieftains in the North and the *Nazim* in the South. The plenty of demand from the above and export demand by the European companies gave necessary impetus to the growth of Bengal cotton industry.

II

In the sixteenth century, Bengal was celebrated for its export of textiles to many regions in Asia and Europe. During 1500 – 1800 Bengal was gradually incorporated into the capitalistic world system through oceanic trade with Europe after the advent of the direct sea route from Europe to Asia via the Cape of Good Hope. The pioneers in direct European maritime trade with India were the Portuguese. It began with the arrival of the Portuguese like Vasco da Gama. Encouraged by the Portuguese trade in the sixteenth century various European nations founded joint-stock companies in the early seventeenth century for trade in India, and among them the English East India Company (EIC) and the Dutch Verenigde Oostindische Compagnie (V O C) were prominent. Calicoes and muslin of singular beauty and endless variety were the important items of export by these companies from Bengal. In A.D. 73, Pliny was aware of the trade and manufactures of India and described the Bengal muslin as 'of superior excellence'.³³

The first European Settler in Bengal, the Portuguese, shipped various things produced by various manufacturers from Bengal. Calicoes of Bengal were a very considerable part of the Portuguese export into Europe in the early sixteenth century. Pyrard de Laval travelled in Bengal in the first decade of the seventeenth century when the trade

³² Orme, *op. cit.*, p.416.

³³ Milburn, *Oriental Commerce*, vol. II, p. 229.

of Bengal was dominated by the Portuguese and commented, that excellently woven cotton clothes of Bengal, were exported.³⁴ Though at one point of time, say by the end of seventeenth century, the Portuguese controlled the sea – routes of the Indian Ocean held no important position in the commerce of Bengal.

The cotton textile industry of Bengal was well established when the English came here. Besides the domestic consumption, Bengal cotton products became the principal article of exports in the world market then. In 1615, Milburn described from Sir Ddudly Diggs's Pamphlet that a considerable quantity of Bengal calicoes was exported from England to other European countries. He also mentioned the estimate given by Munn which shows that the annual export of calicoes from Bengal to England was 50,000 pieces in 1628. That estimate also exhibits that the cost of those calicoes were on an average 7 s per piece in India and were sold in London at 20 s per piece.³⁵

From 1631 painted calicoes started to be exported from Bengal in considerable quantities by the English East India Company. During 1653 – 1656, the Bengal calicoes captured the World market thanks to its low price and high quality. The English East India Company supplied it to many parts of Europe and even Amsterdam itself. Later their export areas declined.³⁶

The English East India Company exported Bengal cotton products even in England during 1656-57, although the cotton manufacturing had existed in England since the beginning of the seventeenth century. However, the industry was not well developed and the quantity of production was small even in 1656-57.

In 1677 England imported Bengal calicoes to the tune of £1,60,000 and by 1680 England imported printed and painted calicoes worth £ 3,00,000 annually for her own

³⁴ Gray, op.cit., p.328.

³⁵ Milburn, op. cit., p. 230.

³⁶ *ibid*, p.230.

consumption.³⁷ By 1699, the supply of Bengal clothes spread in the British market to a great extent and its price came down to a very low level, so much so that it became ruinous to the English cotton manufactures. From 1700, British Parliament enacted different laws prohibiting the supply of the Indian muslin and calicoes in England. According to the Act of 1700, from and after 29th September, 1701, the import of all painted, dyed and stained calicoes from India was prohibited, although import from India to England was allowed for re-export in the law.³⁸ According to the Act of 1720, the use of stained or dyed cotton cloth of India in Britain was a penal offence.³⁹

The lion's share of the textiles imported in the Nederland was coarse goods which were re-exported. The Dutch company had been extensively involved in intra-Asian trade. Between 1660 and 1680, according to Mr. Moreland's calculation, Japan took nearly one-tenth of all the cotton goods shipped by the Dutch from Batavia.⁴⁰ The Dutch exported cotton manufactures of Bengal to Siam, Moluccas, Ambionia, South Africa, Arabia, Persian Gulf, Egypt and adjacent parts of North Africa. The export items of them consisted mainly of calicoes and ordinary muslins.⁴¹

Table 2.1 given below shows the percentage share of different textile categories of Bengal exported by the Dutch to Batavia, Japan and Persia in 1730-55.

³⁷ *ibid*, p. 230.

³⁸ Quoted in Ray, Identifying the woes of the cotton textile industry, *EHR*, Nov. 2009, vol.62,4, p.6.

³⁹ *Ibid*.

⁴⁰ Moreland, 'Indian Exports of Cotton Goods in Seventeenth Century', *Indian Journal of Economics*, 1924-25, vol. 5, p. 241.

⁴¹ *ibid*, p. 241.

Table: 2.1: Percentage share of different textile categories of Bengal exported by the Dutch to Batavia, Japan and Persia in 1730-55

Categories	Gunnies	Ord. Calicoes	Muslins	Silk	Mixed	Others	Total
A. BATAVIA							
(1)1730s							
Total Pieces	263,375	277,284	29,985	(#)	(#)	13,414	584,022
% Share	45.10	47.48	5.12			2.30	100
(2)1740s							
Total Pieces	258,961	96,641	53,986	(#)	(#)	22,419	432,007
% Share	59.94	22.37	12.50			5.19	100
(3)1750s							
Total Pieces	228,955	109,668	16,915	(#)	(#)	16,346	371,884
% Share	61.57	29.49	4.54			4.40	100
B. JAPAN							
(1)1730s							
Total Pieces	0	27,299	(#)	120,989	72,862	9,488	230,648
% Share		11.84		52.46	31.59	4.11	100
(2)1740s							
Total Pieces	0	2,980	(#)	21,359	10,370	1,377	36,086
% Share		8.26		59.19	28.74	3.81	100
(3)1750s							
Total Pieces	0	7,086	(#)	9,381	2,200	1,677	20,344
% Share		34.83		46.11	10.81	8.25	100
C. PERSIA							
(1)1730s							
Total Pieces	14,000	22,972	13,760	(#)	10,060	4,590	65,382
% Share	21.41	35.14	21.05		15.39	7.01	100
(2)1740s							
Total Pieces	32,363	3,582	23,036	(#)	6,069	3,600	68,650
% Share	47.14	5.22	33.56		8.84	5.24	100
(3)1750s							
Total Pieces	0	3,300	8,275	(#)	0	2,600	14,175
% Share	0.00	23.28	58.38		0.00	18.34	100

Compiled from S. Chaudhury: *From Prosperity to Decline*, p. 199. # or small included in "others"

After 1720 the Dutch began to fall rapidly behind the English and a quite unnecessary ostentation and corruption ultimately led to the extinction of their position as a political and commercial power in Bengal and also in the rest of India. The Dutch

were unable to withstand the competition of the English and the French in the eighteenth century.

III

The cotton industry of Bengal was a rural domestic handicraft industry which grew adjacent to agriculture. In the era of extremely difficult communication, villages far away from administrative and military centres were developed as a self-sufficient economy, and the needs of the people were simple. In this period caste system was a predominant factor in both social and economic life of Bengal. Every kind of work was hereditary and each craftsman inherited the right to work for certain families. There were separate castes for carrying on different professions. These hereditary occupations led to the occupational divisions. There were three stages in the cotton industry of Bengal as follows.

First Stage: It consisted in freeing the cotton from the seeds and in beating it with an instrument so as to make it fit for being spun. Generally the women of peasant families, who spun, also engaged in cleaning and beating.

Second Stage: Spinning was the second stage which employed the largest number of workers. Generally, the women of all castes were engaged in the production of cotton thread for the weavers.

Third stage: Weaving was the third stage which unlike spinning was confined to a particular caste.

Weaving was carried on by the people who belonged to weaver caste but when the demand for cloth increased many people from other castes became weavers. There were two types of economic institution namely the domestic industry and the guilds which originated in the country during the early ages. In the domestic system, workers formed small groups. Each group used to produce and consume for itself, and there was little exchange of commodities and no proper market. In the second

system, though the different castes retained their individual social entity, all of them were members of the same guild regulating the industry.⁴²

Membership of guilds was hereditary but new members were allowed to enter on payment of entrance fees. The guild tested the efficiency and the knowledge base of the new entrant. The guild strictly fixed the hours of work, holidays of a year and stipulated regulations about the various details of work. In Dhaka, for example, the working hours were from 6 or 7 o'clock in the morning till noon and then again from 2 or 3p.m. to 6 or 7 p.m. There were to be forty holidays in a year, when labour was suspended. The conditions of the Hindu guild fit in very well with the European guilds of the middle Ages.

The Indian guild had also various common feasts and other activities as in its European counterpart, and helped the members in every direction. The common fund was used for supporting the poor, building and keeping temples and schools, for celebrating festivals and even for conviviality of various sorts. A popular way of raising funds was by giving the sole right to sale to a particular shop on a fixed day and to get the monopoly over sale for the day, the shop had to pay an amount, often settled by auction. The guild feast was celebrated just as they were in Europe, with mystery plays, processions, pantomimes, etc. The greatest festival of Dhaka Guild was the Birth of *Krishna*, or *Krishna-Janmastami*.⁴³

In the early stages of the guild, we find simple system of production with little division of labour. In this regard Baines observed that the process of cotton production in India was not divided among different groups.⁴⁴ But as the market for cotton manufactures had widen up, the process of making clothes became highly specialized and that ensured considerable division of labour. According to Taylor's

⁴² Birdwood, *The Industrial Arts of India*, vol.1,p.139.

⁴³ Thomas, P.J., 'The Indian Cotton Industry, about 1700 A.D.', *Modern Review*, Feb.,1924, p.135.

⁴⁴ Baines, *The Hist. of cotton Manufacture in Great Britain*, p.74.

description, in the district of Dhaka the production process gradually became complex where specialization and division of labour were similar to the specialization and division of labour in the English Woollen Industry during the early period of the Industrial Revolution. A small independent producer who was a member of guild, used to invest his own capital and employ his own family labour. He used to deal with customers directly, and so there existed no middleman between the producers and the customers. Here, the possibility of creation of fraud business was little. The production was carried on by the master weavers. A master weaver having two or three looms employed hired labour for production. He used to employ an apprentice (*nikari*) and a journeyman worker (*kareegar*) on temporary basis. The employment of boys as *nikaries* was a common feature. As Taylor described, the boys of fourteen years of age might be seen working at the loom and more than often they appeared to be experts at the business.⁴⁵ Here the craftsman was independent. He had to perform many roles as an employer, merchant, foreman and even workman, all by himself.

When different European companies came, the export demand for cotton goods increased to a large extent and the cotton industry of Bengal started to flourish gradually. At that time the entire system of production underwent a change and as a result the earlier independent producers started to work under the '*Mahajans*' who were like the '*Clothiers*' in England with a slight difference. The '*Clothiers*' were more enterprising craftsmen but a '*Mahajan*' was more a broker or wholesale agent than a craftsman. The '*Mahajans*' were actually the capitalist class that provided a substantial part of necessary capital and used to make advances to the weavers for the supply of clothes at a fixed price. A '*Mahajan*' used to appoint *paikers* and *mookeems*. The *paikers* used to meet the weavers and advance money. The *mookeems* used to inspect the making of clothes. The '*Mahajans*' often had a business of money lending along with his cloth business. The exploitation of the weavers by the '*Mahajans*' was possible because the weavers were poverty ridden. The weavers sometimes worked themselves i.e. they did not work under the '*Mahajans*'. Whether

⁴⁵ Taylor, *A Descriptive and Historical Account of the manufacture of Cotton at Dacca in Bengal*, p.78.

working under the 'Mahajans' or independently, the weavers carried on their business in the traditional way with the help of his family by appointing a *nikari* and a *kareegar*.

The best season for weaving fine muslin was from the middle of May to the middle of August owing to an excess of moisture in the atmosphere during these three months.⁴⁶ The coarser fabrics could, of course, be produced throughout the year. But outcome was generally much greater in summer than in winter.

The weavers were paid one *anna* and a half (2d.) per day for preparing thread for the loom, 2 to 3 *annas* (3d. to 4 ½ d.) per day for weaving plain muslins and 11 *annas* (6d.) per day for weaving flowered muslins. Sometimes the weavers who produced flowered muslin were paid according to the number of figures they made – generally 1 *anna* for seven figures.⁴⁷ All of them were served mid-day meal by the employer and there was a personal relation between them as distinct from 'the cash-nexus' of modern factory employment.⁴⁸ There has been a homely relation between the master and their employees. A boy at the age of 10-12 joined as an apprentice.⁴⁹ The apprentice was housed and fed by the master. Besides he was given 2 to 3 *annas* per month as pocket money.⁵⁰

In Mughal period, the powerful Kings built up many big *karkhanas* for manufacturing various kinds of handicrafts. The excellent craftsmen in different fields of industry were assembled in a *karkhana*. These state *karkhanas* were made and maintained in Dhaka and certain other places during the Mughal period for producing fine muslin. The description of these *karkhanas* is found in the *Ain-i-Akbari* by Abul Fazl and also

⁴⁶ *Ibid*, p.37.

⁴⁷ *Ibid*, p.78.

⁴⁸ Thomas, *op. cit.*, p.138.

⁴⁹ Taylor, *op. cit.*, p.78.

⁵⁰ Thomas, *op. cit.*, p.138.

in the writings of Bernier. Bernier, in 1666 found such *karkhanas* in many places and he called them 'halls'. According to him, large halls or workshops for the artisans or *karkhanas* were seen in many places. In one such hall, embroiders were found busily employed, superintended by a master; in another you could see goldsmiths, in a third painters, in a fourth varnishers in lacquer work, in a fifth joiners, turners, tailors, shoe-makers, in a sixth manufacturers of silk brocade and fine muslin.⁵¹ These *karkhanas* were called '*mulboos khas'cooties* i.e the factories for making 'royal clothing'. According to the description of Taylor, there existed such *karkhanas* in Dhaka, Sonargaon and Junglebarray.⁵² These *karkhanas* were superintended by *Darogas* whose prime duty was to inspect the production of all the cloths made for the Emperor's use.⁵³

As the agent of the *Darogas*, the *Mookeems* inspected every day the threads which the weavers brought for their looms. Those weavers selected for State *karkhanas* were supposed to be the best producers and they were bound to follow some strict rules, failing which they were punished. *Jamdaunies* or embroidering cloths, the exclusive products of Dhaka, were also produced in the State *karkhanas* for the Emperor's use. The raw materials were supplied by the State and the weavers were paid their salaries directly from the State Treasury. The weavers were compelled to work in the *karkhana* were not paid salaries in accordance with their skill and sometimes a part of their salaries was exploited by the *mookeems*. All these forcefully impoverished the weavers in spite of their excellent skill.⁵⁴

The production system of the cotton industry of Bengal had changed gradually with the expansion of trade and commerce by the European companies in Bengal. From

⁵¹ Bernier, *Travels in India*, p. 259

⁵² Taylor, *op.cit.*, p. 78

⁵³ *ibid.*

⁵⁴ Sarker, J.N. , *Mughal Administration* , p.162.

the seventeenth century, the English, the Dutch and the French were engaged extensively in cotton trade in Bengal. Among them the English reached the superior position in the commerce of Bengal to other merchants, Indian and Foreigners as well from the outset of the eighteenth century, particularly after obtaining the *Firman* from the then Mughal emperor, Farukshiar in 1717.

In the first half of the eighteenth century, the British East India Company established many factories in different parts of Bengal like Hooghly, Dhaka, Cassimbazar, etc. Here, a factory means a house of agency for the sale and purchase of goods on commission. At that time the traditional 'Dadni System' of production flourished. *Dadni* or advances were given to the weavers by the Merchants through a host of intermediaries like *dalals*, *gomastas* and *paikars*. But at the same time goods were bought with ready money also. The rich weavers often invested their own capital for the production of clothes.

It was a common practice for respectable families of the weaver caste to employ their own capital in manufacturing goods, which they sold freely on their own account. At Dhaka in one morning 800 pieces of muslin brought by the weavers of their own accord were purchased at the door of a single gentleman.⁵⁵

The East India Company procured cotton products from the weavers through the *dadni* Merchants and always imposed strict control over the Merchants. The companies gave securities to the Merchants and took necessary steps against sending clothes of inferior quality.⁵⁶ The Merchants always did not abide by their contracts and failed to supply the said quantity of goods in time. For this reasons the company reduced the emphasis on this system of advances and started procuring necessary items with ready money. In this new system the procurement of cotton goods was

⁵⁵ Choudhury, *From prosperity to Decline etc.*, p.147.

⁵⁶ Quoted in Dutta, K.K., Letter to the Court, 11th Dec, 1741, *Studies in the History of the Bengal Subah*, p.124.

usually done by the company through their *gomastas* or agents directly from the *aurung*.⁵⁷

The method of procurement of goods by ready money system remained satisfactory for the time being. But with the advancement of time, the *gomastas* became very powerful and they abused their power to fulfill their own interest. The East India Company then started implementing another method where the weavers were directly attached with the company. They were given advances and bound to submit their total produce to the company only. In this new system a large number of *gomastas*, *paikars* and *dalals* were employed by the company at every *aurung*. Their duty was to inspect strictly whether clauses of the contracts were obeyed by the weavers or not.

The production organization changed drastically after the Battle of Plassey in 1757 and a new production organization emerged in the industry when the British captured all political and economic power of Bengal.

IV

Bengal imported raw cotton from Surat, Doab, Berar and certain other parts of the Decan. K.N. Chaudhuri, could not find any logical explanation for why Bengal imported cotton from Central India and Gujrat via sea-route though it had all the potentiality of growing cotton to suffice its own needs.⁵⁸ Colebrooke describes that at one point of time cotton was cultivated in Bengal and the total production was nearly equal to the total need of her cotton industry.⁵⁹ A fine quality of cotton was produced in the eastern part and a coarser kind was gathered in every part of the province.⁶⁰ According to Pyrard, in early seventeenth century cotton was so plentiful

⁵⁷ Datta, K.K., ed., *Fort William India House Correspondence, 1748-1756*, vol.I, Letter to court, 18th Jan, 1754, para 34, p.762.

⁵⁸ Chowdhuri, K.N., 'The Structure of Indian Textile Industry in the Seventeenth and Eighteenth Centuries', *Indian Economic and Social History Review*, 1974, vol. 11, p.175.

⁵⁹ Colebrooke, *Remarks on the Husbandry and Internal Commerce of Bengal*, p. 130.

⁶⁰ *ibid*, p. 131.

in Bengal that after providing enough for her own consumption for the production of clothes, she exported cotton.⁶¹ The finest quality of cotton in the world was produced in the vicinity of Dacca. This finest cotton known as *kappas* was cultivated only on a small area on the bank of the River Meghna which is only 40 miles long and 2-3 miles wide.⁶² In the said vicinity two superior quality of cotton was primarily cultivated. They were *phootee* and *bhyratti*.⁶³ The world famous Dhaka muslins were produced from those cottons. As pointed out by Joseph Bebb, the then Resident of Dhaka, around 1790 *phootee* was considered superior to *bhyratti* by the Dhaka spinners.⁶⁴ The fine muslins of the Dhaka district were *mulboos khas* (the King's muslin and were used by the emperors' family of Delhi), *sarkar-alis* (like *mulboos khas* and were used by the emperors' family of Delhi), *ab-rawans* (running water), *shabnams* (evening dew), *shubnams* (morning dew), *nyansooks* (soothing to the eyes), *seerbati* (semitransparent like sherbet), *terrandams* (clinging to the body), *charkhanas* (checked muslin), *dooreans* (striped cloth), *dokinas* (white striped clothes), *saktas* (white striped clothes), *jamdanis* (designed muslin), *tanjibs* (ornament of body), *buddun khas*, *kumees*, *rangs*, *jhunas* (much worn by dancing women), and *allabalies*.⁶⁵ Some finer quality of cotton called *nurma* or *caur* was produced in Malda, Radhnagar, and Burdwan. Some fine muslin clothes like *nyansooks*, *mulmuls*, *seerbati*, and *dooreans* were produced from the *nurma*.⁶⁶ Some coarser varieties of cotton such as the *corree*, the *bhoga* and the *muhree* were produced in different parts of Bengal. *Bhoga* cotton was produced in Malda, Haripal, Birbhum, Bisnupur, and Burdwan. *Muhree* was cultivated in Burdwan, Radhnagar, and Haripal. *Corree* was produced in Haripal. From that coarser cotton some coarser

⁶¹ Gray: op cit, p. 328.

⁶² quoted in Chaudhuri, K.N., op.cit., p 175.

⁶³ Medlicott, J. G., *Cotton hand-book*, p. 108.

⁶⁴ Ibid.

⁶⁵ Watson, J. F., *The Textile Manufactures*, p. 75.

⁶⁶ *Reports and Documents*, pp. 302-323.

clothes such as *garha*, *guzzees*, and *dooties* were produced for the native people.⁶⁷ As the demand for cotton manufactures of Bengal increased gradually and her cotton cultivation declined, Bengal cotton industry had to depend on other provinces of India for its demand of raw cotton.

Prices of cotton goods manufactured in of Bengal varied to a great extent because large varieties of products were produced. A large variety of muslin, the finer cotton product, and different types of calicoes were produced. The Dhaka muslins which were produced for the use of the provincial *Nawabs* or for the use of the Mughal Emperors were very costly. From Taylor's description we learn that the price of Dhaka *jamdaunies* were Rs. 250 a piece in the time of *Nawab* Sirajuddaullah (1756-57).⁶⁸ At that time a piece was even priced Rs. 450 which was made for Muhammed Reza Khan, the *Naib Nazim* of Dhaka. But in 1752-53, the *jamdaunies* exported by the Dutch and the English were only Rs. 31-43 per piece.⁶⁹

The prices of different types of muslins and calicoes are illustrated in the following two tables.

Table 2.2 shows the different types of two principal muslins, namely *khasa* and *mulmul*, and their respective prices which the English East India Company contracted for their supply with Calcutta Merchants in 1742. Table 2.3 shows the cost prices of some of these textiles procured in different areas of Bengal by the Dutch Company in 1752-53 and also in 1754-55.

⁶⁷ *ibid.*

⁶⁸ Quoted in Chaudhuri, *From Prosperity to Decline*, p. 144, Taylor John: Home Miscellaneous Series.

⁶⁹ *ibid.*

Table: 2.2: Different types of two principal muslins namely *khassa* and *mulmul* and their respective prices at which the English East India Company contracted for their supply with Calcutta Merchants in 1742

Name of Piece-goods	Length x breadth (in covid)	Price per Piece	
		(Rs)	(As)
<i>Khassa</i> Malda fine	40 x 3	17	8
<i>Khassa</i> Malda flowered	40 x 3	22	5
<i>Khassa</i> Cogmaria	40 x 3	9	8
<i>Khassa</i> Cogmaria	40 x 2 ¼	7	6
<i>Khassa</i> Orrua	40 x 2 ¼	7	12
<i>Khassa</i> Orrua flowered	40 x 2 ¼	12	8
<i>Khassa</i> Serry	32 x 1 ¾	3	3
<i>Khassa</i> Burron	40 x 2	4	12
<i>Khassa</i> Kumarkhali	40 x 2	4	12
<i>Mulmul</i> Santipur	40 x 3	10	-
<i>Mulmul</i> Santipur fine	40 x 3	16	8
<i>Mulmul</i> Santipur	40 x 2 ¼	7	12
<i>Mulmul</i> Santipur	40 x 2	6	12
<i>Mulmul</i> Cossajura	40 x 2	11	-
<i>Mulmul</i> Santipur fine	40 x 2	19	-
<i>Mulmul</i> Santipur fine	40 x 2 ¼	22	8
<i>Mulmul</i> Santipur fine	40 x 3	30	-
<i>Mulmul</i> Serry	36 x 1 ¾	4	2

Compiled from S. Chaudhury: *From Prosperity to Decline*, p. 140.

Table: 2.3: Cost prices of some textiles procured in different areas of Bengal by the Dutch Company in 1752-53 and in 1754-55

Name of Piece-goods	Category	Production area	Price per piece (in Florin)
<i>Khasa Junglebarry</i>	Muslin	Dhaka	72-73
<i>Khasa ordinary</i>	Muslin	Hughli	13-15
<i>Mulmul ordinary</i>	Muslin	Hughli	11-13
<i>Duriyas</i>	Muslin	Dhaka	46-51
<i>Duriyas</i>	Muslin	Hughli	25-29
<i>Humhum</i>	Muslin	Hughli	11-12
<i>Bethilas</i>	Fine Calico	Hughli	11-12
<i>Chowtars</i>	Fine Calico	Hughli	12-12.5
<i>Bandanas</i>	Silk	Kasimbazar	8-9
<i>Armosin (Taffeta)</i>	Silk	Kasimbazar	8.5-9.5
<i>Dheris</i>	Silk	Kasimbazar	17-18
<i>Baftas</i>	Coarse calico	Dhaka, Hughli	8.5-9
<i>Guinees</i>	Coarse calico	Hughli, Kasimbazar	13-14

Compiled from S. Chaudhury: *From Prosperity to Decline* etc., p. 143.

V

From time immemorial, the cotton manufactures of Bengal were famous all over the world. The Mahabharata, the Ramayana and the Puranas are full of references to the cotton goods of India. Among all the territories of India, Bengal was the most renowned for her excellent cotton manufactures.

From the early seventeenth century (i.e. during the Mughal period) the traditional cotton industry of Bengal reached a dominant position both in the Indian market and

in the International market when the European merchant companies like those of the Portuguese, the English, the Dutch, the French and the Danes exported the Bengal cotton goods to international markets.

At the beginning of the eighteenth century when the powerful Mughal Empire had started to decline with the death of Aurangzeb in 1707, the Indian subcontinent fell into the grip of a political instability which hampered the growth of the industry. This political turmoil did not affect Bengal much till the first half of the eighteenth century because in that period Bengal was in the hand of powerful *Nawabs* like Murshidkuli Khan and Alibardy Khan. So, prior to the Battle of Plassey the cotton trade and the cotton industry of Bengal continued to grow as before. The English reached their dominant position in the Bengal Economy after the grant of the Farman by Farrukshiyar in 1717 to the English East India Company. The English East India Company exported a large amount of cotton manufactures from Bengal to both their home country and the rest of the world. The quality of Bengal cotton goods was so acceptable to the English and other European markets that the English machine made products were far from the competing with the Bengal manufactures. The Bengal textile and calicoes captured the English market to such an extent that the English Parliament enacted laws against their importation. These prohibitive measures, however, had little adverse effect on the export of the Bengal cotton manufactures, as the English merchants carried on a lucrative re-export trade in Europe.

In spite of many hurdles, the cotton industry of Bengal, therefore, maintained her position of prominence in the International market during the period prior to 1757.

Chapter - III

Chapter – III

Techno-economic Environment for the Industry: A Comparative Analysis between Great Britain and Bengal

The actual date of cotton-spinning and weaving in Bengal cannot be arrived at, though there is little doubt about its antiquity. During the early trade of Europe with India, the calicoes and muslins of Bengal were well accepted by the people of the different parts of the World. Bengal textile manufactures of several varieties flooded the European market in the seventeenth and eighteenth centuries, reaching its peak in the mid eighteenth century. The English cotton manufacturers were the main competitors of Bengal in the World market. From the beginning of the eighteenth century, there were two principal production centers of cotton goods in the Global context, with Bengal at one end and England at the other. The cotton textile industry of Bengal was running under severe competition with the cotton textile industry of England as the latter progressed rapidly due to Industrial Revolution or technological innovation and the English industry could win over Bengal's competitive edge by the first half of the eighteenth century. This chapter seeks to compare the different technological and economic aspects of the cotton textile industry of the two production centers of the World and identify the factor(s) behind the triumph of the English industry over the Bengal industry in the World Market.

We have incorporated five sections. Section I compares the technology of production in both countries during 1757 – 1857. Section II compares the labour cost of production between two countries in the said periods. Section III compares the position of the two production centres in respect of availability of raw materials. In Section IV, the economic environment of the two countries have been discussed and compared. Section V is a concluding part.

I

The technology of production of Bengal cotton textile industry was quite simple and the process of production was very crude. The stages of production as described by Watson⁷⁰ are as follows.

Cultivation and Spinning of Cotton:

Cultivation and spinning of cotton were part time jobs like any other domestic chore. Cultivators specially the female members of the family engaged themselves in these works as a part of their household duties. Sometimes cultivation became the prime job due to increase in demand for Bengal cotton clothes. Spinning was just like a small scale industry involving part time workers. Female members were engaged in the spinning processes. It is worth mentioning in this regard that weaving of clothes was done mainly by weaver community, but the spinning was done by other groups of people as well. Weavers, 'Jugi', 'Jaluha' and even *Kayastha*, *Baidya*, upper caste like *Brahmin* were found doing spinning work. Female members of the family played the leading role. For the production of thick and coarse threads 'Charka' was used and for thin and fine threads 'Taku'(spindle).

Spinning involved hard work and a large number of people. As the first step, cotton seeds, soil, dust or other filthy materials were to be separated from cotton using of jaws of 'Boal' fish. The jaws with small thickly arranged teeth served the purpose of a comb. Thereafter, the cotton was rolled round a piece of wooden stick. The cotton balls were transformed into threads by either Charka or *Taku*. The threads were rolled round a bamboo stick.

Now we consider the dyeing of the threads. The threads used to be coloured by the indigenous dyers. They used indigo, lac, mulberry, etc. for the purpose. A yellow dye resembling madder which was extracted from the seed of a shrub called the *Cumla*

⁷⁰ Watson, J. F., *The Textile Manufactures and the Costumes of the Peoples of India*, pp. 64-74.

Gooree. Sometime, an indigenous variety of yellow dye was used which was extracted from the fibres of the root of *auch* trees.

Weaving:

Weaving of clothes was the next step after spinning. Some complicated process, hard labour and time consuming factors marked the step of weaving.

Winding and preparing the yarn:

Generally fine threads were used in '*Banai*', and coarse threads in '*Tanai*'. '*Tanai*' threads were kept submerged in water for 3 days. Then the threads were pressed to dry and kept in small bamboo sticks. Weavers used to wind the threads round a big bamboo stick. These sticks rolled with threads were again placed in water. After squeezing, the threads were placed in the sun to dry them completely. Good threads were chosen by workers and kept in charcoal-mixed water for 2 days. These threads were cleaned with the fresh water. After squeezing, the threads were kept in shadowy areas for drying. Again the threads round '*Natai*' were placed in water for a day. The substance called '*mur*' prepared from '*Khai*' and limewater were used for better smoothness of fibres. Threads were dried up in sun-light. Three varieties of dry threads were selected on the basis of thinness. First grade thin fibres were placed in the right side of the '*Tana*', second grade ones on the left hand side and the third grade ones in the middle.

Warping:

Warping was generally done in an open field near residential place of weavers. Two sets of bamboo were inserted transversely into the ground as pillars on two sides for weaving a full length of cloth. The weaver was to traverse slowly from one end to

other end with glass particles in two hands in such a way that the 'mul' would touch the hands. This process was to be repeated carefully time and again. Glass particles were just like a 'natai' with a glass ring. 'mul' of thread came out easily through the said ring.

Tana and Mana Bandha or Applying the reed to the warp:

'Mana' popularly known as 'Chatai' was a structure made of small thin bamboo sticks. Afterwards the threads of 'tana' and 'mana' were placed in hanging position from the roof of the house. Then two persons exchanged the threads of 'tana' and 'mana,' and ultimately the threads of 'tana' were tied to 'mana'.

Narod Bandha or Reeling Yarn from a Reed:

The next step was beaming. One person just behind the weaver placed the 'tana' threads above 'mana'. Another person was to unfold it and place the fine stick within it. This stick was tied to the 'narod' tightly behind the weaving apparatus. For this purpose one 'cane comb' and a 'curved cane stick' were used. After the placing of the 'narod' with 'tana', threads were folded systematically.

Bo Bandha or Forming the Heddles:

'Bo' was a type of string. 'Tana' threads were tied with this 'Bo'. 'Tana' threads rolled around 'narod' were unfolded slowly and placed horizontally. Then a thin piece of bamboo was inserted in between 'tana' thread and 'mana' for making a 'Bo.' After that the weaver made a 'Bo' with two 'tana' threads taken by finger tips. This process continued thoroughly for the entire period.

Weaving:

The last step was weaving. Four bamboo poles were placed in four corners for weaving, another four bamboo sticks were kept horizontally and tied to those bamboo poles. Then the weaver engaged himself/herself with weaving with some instruments, two bamboo treadles and a '*maku*'. Weaver was to sit in an inclined position forwarding the right leg on a mat or '*takta*' beside the specially designed cave-in portion (hole). Then the weaver pressed the treadle with the tip of left leg and subsequently changed the '*maku*' from one hand to another hand with high pressure. Ultimately '*tana*' threads were tied to '*mana*' threads and thus weaving started. The weaver used to work continuously in this way for weaving a full-size cloth.

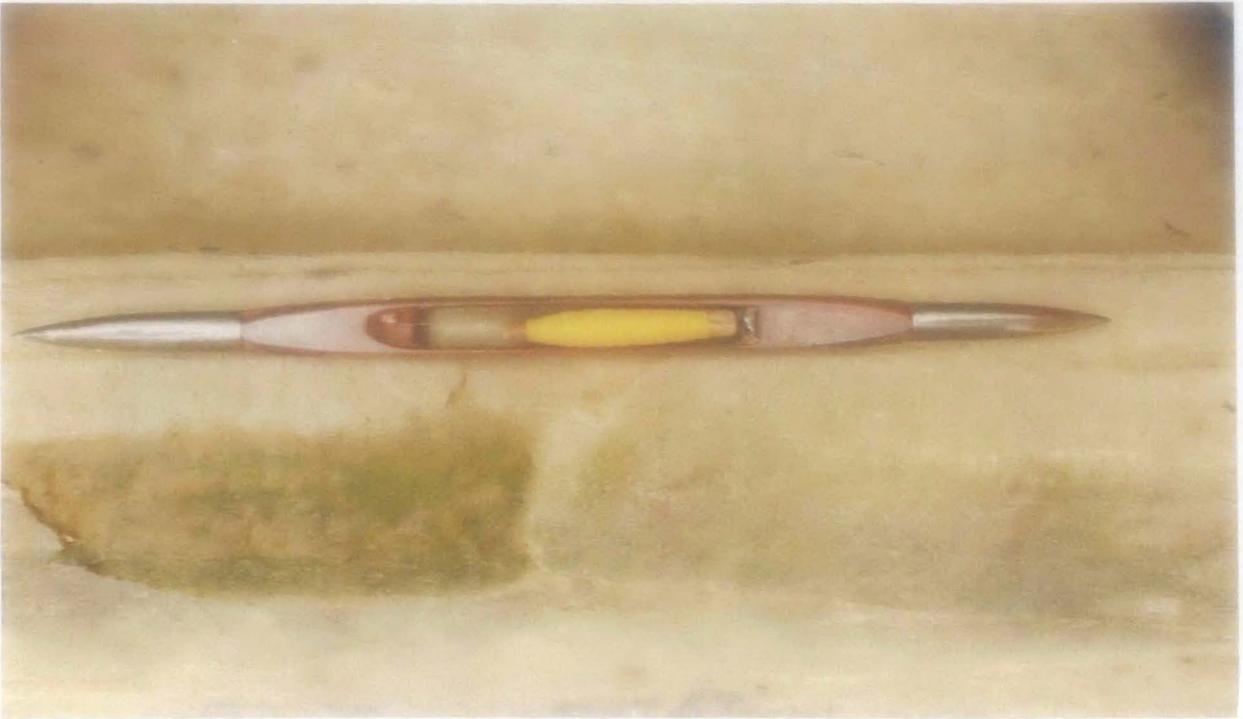
Several steps after weaving:

Washing was an important step after weaving. Generally Hindu washer men used to clean the clothes. Fresh clean water, good alkali or soap and efficient washer-men were required for proper washing. Washer men used to clear the iron strains with '*amrul*' extracts. They had the habit of making a mixture of *ghee*, lemon and alkali for erasing the strains on cloth. Some anomalies or haphazard condition of threads were seen after washing. '*naradia*' arranged the threads in proper way, and '*rifukar*' performed '*rifu*' or mend efficiently in the portions of cloth where threads detected as damaged. Usually the '*naradia*' and '*rifukar*' were Muslims. The *kundukar*, a specific class of people, were engaged to make the clothes smooth and soft.

Following pictures show the different stages of cotton textile production.



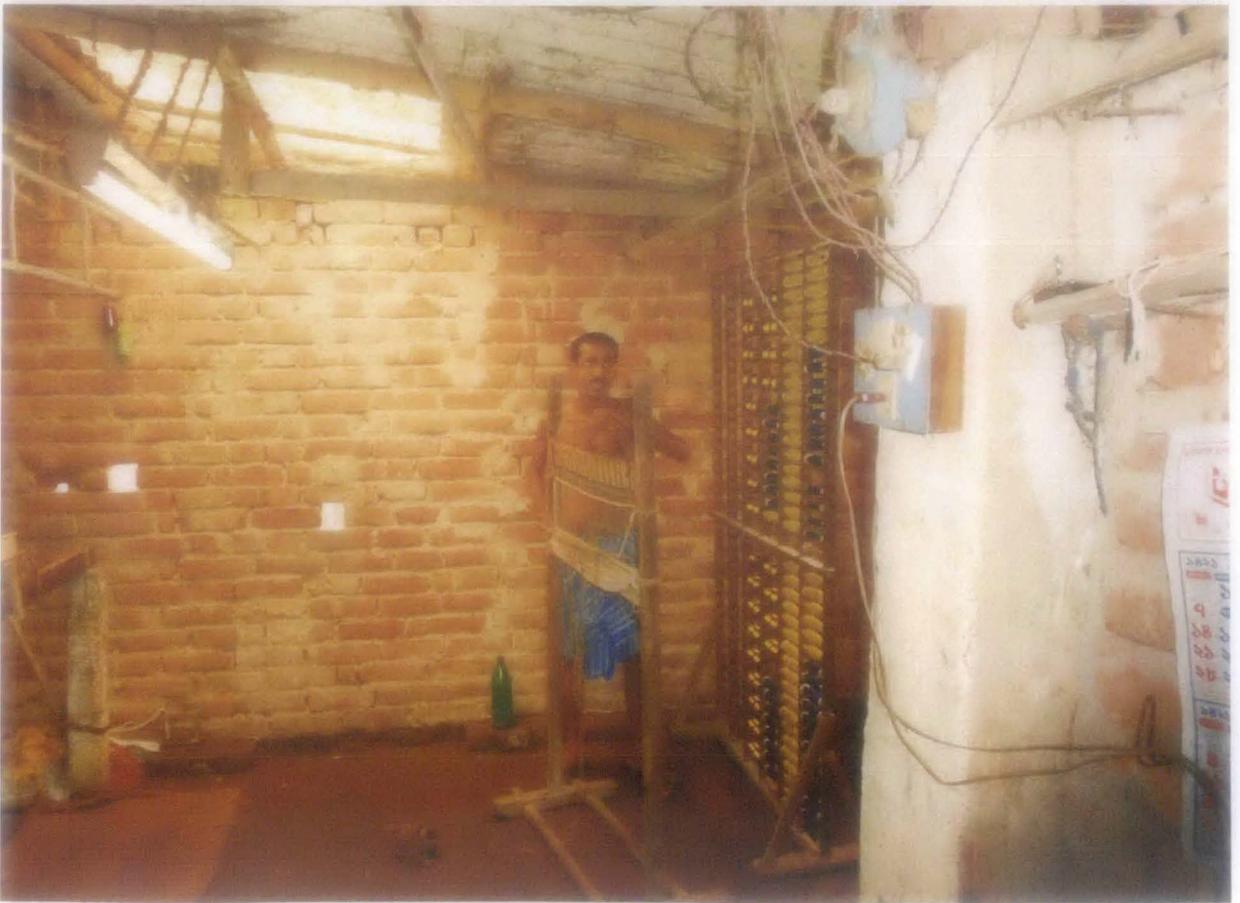
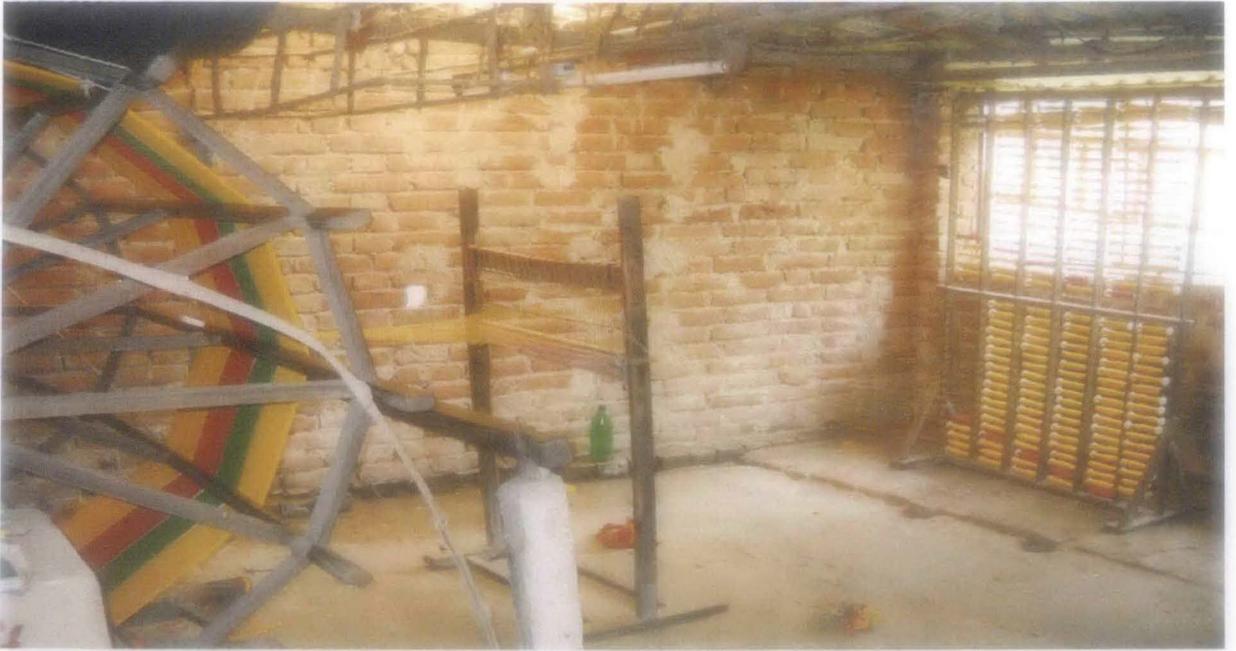
Spinning



Maku



Natai



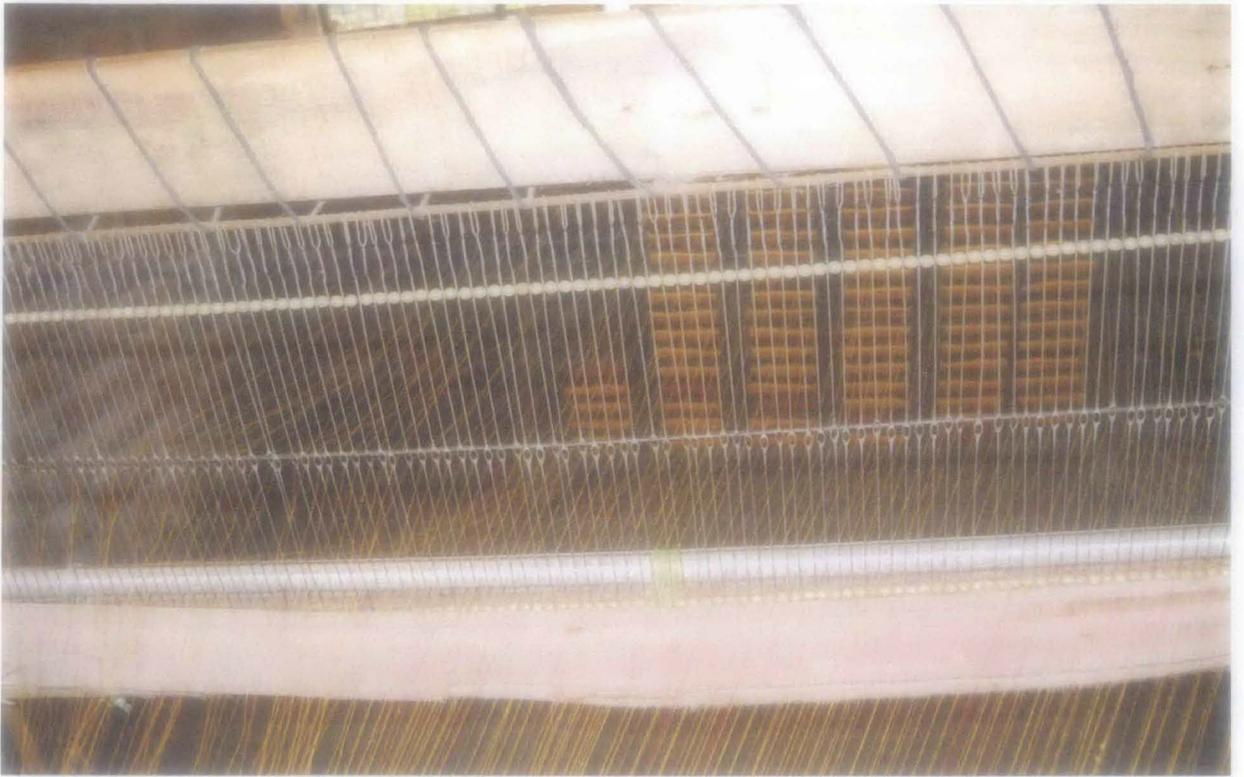
Tana Suta or Tana Threads



Tana and Mana



***Narad Bandha* or Reeling Yarn from a Reed**



Bo Bandha or Forming the Heddles



Weaving

On considering the cotton textile industry, of England we find that the technologies of production before and after the technological innovation were completely different. Before 1760, textile was manufactured domestically where all members of the household used to take part in the process of production. Even children were engaged in cleaning and carding the raw cotton and in helping the weavers.⁷¹ Women used to spin the yarn and men did the job of weaving the cloth.⁷² Cotton manufacturing was a subsidiary occupation to agriculture and other than in Manchester, majority of the weavers were farmers.⁷³ The production process was not at all simple but rather tedious and inefficient. The putting-out system was widely practiced, where the merchants used to distribute the raw materials to the spinners and weavers. Those merchants were found all over the countryside.

The technology and production process of the cotton textile industry of England were more or less similar to that in the Bengal industry before the introduction of many modern power-driven machines by the English manufacturers. As Baines mentioned that till 1760, the machines used in the cotton manufacture in England were nearly as simple as those of India; though the loom was more strongly and accurately constructed, and cards for combing the cotton had been adopted from the woolen manufacture.⁷⁴ Before the Industrial Revolution in England, the total production process was carried on by hand, either in the homes of the workers or in the small shops of the master weavers. Almost all the fibers were cleaned, carded, and spun by hand. In that pre-factory forms of organization, there were many independent craft shops where master weavers appointed and assisted one or more journeymen or apprentices. In the thirteenth century, that sort of independence came to an end in many areas and the artisans had become bound to the merchant who supplied

⁷¹ Deane, P., *The first industrial revolution*, p. 88.

⁷² *Ibid.*

⁷³ *Ibid.*

⁷⁴ Baines, E., *History of Cotton Manufacture in Great Britain*, p. 115.

necessary raw materials and in return procured the finished products. That subordination of the producers to the intermediary was a result of the growth of market. The artisans were unable to know and exploit the demand of the consumers staying at distant places. The informations were gathered by the merchants about the changes in tastes of the consumers. They used to give necessary directions to the producers and necessary tools as well as required raw materials for the production of goods as per consumers' demand.⁷⁵ It was largely in this way that the production had come under the putting out system. In those days the English cotton manufactures lagged far behind the producers of muslins and calicoes in Bengal. Orme described that the women spun the thread designed for the cloths and then delivered it to the men, who had fingers to model it as exquisitely as those had prepared it. The tools which they used were as simple and plain as they could imagine them to be. The rigid clumsy fingers of a European would scarcely be able to make a piece of canvas with the instruments, which were all an Indian used, to employ in making a piece of cambric.⁷⁶

When, we consider the technology of production in England after technological innovation, we come across a drastic transformation in the total scenario. The cotton industry of England, underwent revolutionary changes with regard to technology. According to Farne, the English cotton industry was the pioneer for the implementation of power-driven machinery and was expanded very rapidly. Its expansion impressed the imagination of the world. The adoption of new technology and the world-wide extension of commerce of the English industry became the fodder of thought for the authors of both *The Communist Manifesto* and *A Non-Communist Manifesto*.⁷⁷ The production of cotton textiles were reshaped by different technical inventions. Kays flying shuttle (which was invented in 1730 and was used widely by the weavers in between 1750 and 1760), Paul's carding machine (which was

⁷⁵ Habakkuk and Postan (ed.), *The Cambridge Economic History of Europe*, Vol. 6, p. 274-76.

⁷⁶ Orme, *Historical Fragments*, p. 413.

⁷⁷ Farne, D.A., *The English Cotton Industry*, p. 6

industry housed in large cotton mills. The wealthy merchants started building mills for the production of cotton yarn and cloth, and it became a profit giving investment. These cotton mills were found mostly in three districts of England e.g. in the North West England centered on Manchester, in the Midlands, centered on Nottingham and in the Clyde valley in Scotland between Paisley and Lanark. By 1780's the industry had become more concentrated in Lancashire with a large number of mills within the Oldham, Bolton and Manchester triangle. From the 1790's the cotton industry grew more rapidly in Lancashire than elsewhere.⁸⁴ The spinners and the weavers became the employees of the factory owners and no longer worked for themselves at home. The workers used to earn their income in the form of wage by rendering their labour for a specific period of time each day. In order to find work many people used to move to the areas where the cotton mills were located. The spinners and weavers then had been able to give up their agricultural activities and engaged themselves fully in manufacturing cotton. There was a considerable rise in the number of weavers and they were concentrated in town. According to Radcliff, during the period from 1770 to 1788 a complete change had gradually been effected in the spinning of yarns, wool had disappeared altogether and linen was also nearly gone; cotton had become almost the universal material for employment.⁸⁵

Through the Industrial Revolution the cotton textile industry of England reached to the highest peak of development by the second quarter of the nineteenth century. Since then their large scale production enabled them to capture the home as well as World market and outclass the Bengal cotton goods.

⁸⁴ Farne, op. cit., p.45

⁸⁵ Radcliff, W., *Origin of the new system of manufacture: commonly called "power-loom weaving,"* p.61.

II

Before the Industrial Revolution and the advent of large scale factory system of production in England, the Bengal cotton textile industry was in an advantageous position in comparison with its nearest rival i.e. the English cotton textile industry because Bengal had one of the major advantages of human resources. Its large population could give the industry abundant supply of cheap labour whereas in England labour was costly. This comparative advantage resulted in lowering the cost of production in Bengal in comparison with its rival. After the Industrial Revolution this comparative advantage of Bengal industry gradually shifted to England. In the post-Revolution period, the Bengal industry was still run by labour-intensive indigenous production methods whereas the English industry started to apply labour-saving method of production, leading to a fall in unit labour-cost in England although the wages of labour in England were much higher than that in Bengal. Here the abovementioned fact will be described with quantitative data.

Since the seventeenth century the Bengal cotton products flooded in the domestic market of Britain and it became a popular fashion with the people there. The domestic textile producers of England became jealous and demanded protection. Baines describes that in the seventeenth century the Dutch and the English East India Company imported Bengal muslin and calicoes in large quantities. As early as 1678 a loud outcry was made in England against the import of Indian cotton goods to protect woolen industry.⁸⁶ The cotton textile producers started to imitate the cotton manufacture of Bengal. But they did not imitate the labour-intensive method of production of Bengal because it was not possible for them to apply it as wages were very high in England.

The cotton textile industry of England remained small in the seventeenth and even in the early decades of the eighteenth century. It was because of the very fact that the Bengal cotton products were high in quality and low in price mainly due to its low

⁸⁶ Baines, op. cit., p.70.

average cost. A pamphlet of 1678 describes that a man's coat made of Bengal calicoes was cheaper than that made of the English one in English market by around 12d.⁸⁷ Bengal had several advantages over other centres of textile production of which the most important was the abundance of cheap and highly skilled labour. The cost of living was low in Bengal due its developed agriculture and the prices of both food and cash crops were also low which ensured low wages as well as low cost of production. According to Chaudhury, such abundance of labour together with the cheapness of staples like rice, wheat and yarn automatically kept the production costs lower in Bengal than that in other regions.⁸⁸ This rural domestic handicraft industry of Bengal was run mostly by family labour where children and women in spite of doing their daily household chores dedicated themselves in the industry without any remuneration and it was a major reason for low cost of production. Many weavers used to took this profession adjacent to agriculture where agriculture was their prime profession. So, they did not care much on their earning from cotton manufacture or their lower wages did not discourage them. The fixed cost was very low because the construction cost of a loom was very low as it was built in the weavers' own houses with the simplest possible low cost implements. This was obviously an important reason for the low cost of production.

After the industrial revolution, the British cotton textile industry became endowed with new machines for production. Due to the technological innovations and advanced factory system of production, the large scale production became possible. From 1766 to 1787 the cotton manufactures of England increased by 5.5 folds in terms of their monetary value. Prior to that period the value of the cotton goods was

⁸⁷ Baines, op. cit., p. 71.

⁸⁸ Chaudhury, *From Prosperity to Decline Eighteenth Century Bengal*, p. 133.

6,00,000 pound starling and it had become 3,304,371 pound starling in 1787.⁸⁹ In England, the cost of production per unit also declined considerably because of the large scale production.

Now, we want to compare the labour cost of production between the two countries in the first half of the eighteenth century when the English industry got fully endowed with new machines but the Bengal industry was still run by age old method of production. The labour cost of production has been analyzed in the following table:

Table: 3.1: The monthly wages of the spinners in different parts of Bengal

Year	Kheerpoy Rs.a.p	Malda Rs.a.p	Radhanagar Rs.a.p
1806-07	3-0-0	2-8-0	3-0-0
1807-08	3-0-0	2-8-0	3-0-0
1808-09	3-0-0	2-8-0	3-0-0
1809-10	3-0-0	2-8-0	3-0-0
1810-11	3-0-0	2-8-0	3-0-0
1811-12	3-0-0	2-8-0	3-0-0
1812-13	3-0-0	2-8-0	3-0-0
1813-14	3-0-0	2-8-0	3-0-0
1814-15	3-0-0	2-8-0	3-0-0

⁸⁹ Baines, op. cit. p. 218.

1815-16	3-0-0	2-8-0	3-0-0
1816-17	3-0-0	2-8-0	3-0-0
1817-18	3-0-0	2-8-0	3-0-0
1818-19	3-0-0	2-8-0	3-0-0
1819-20	3-0-0	2-8-0	3-0-0
1820-21	3-0-0	2-8-0	3-0-0
1821-22	3-0-0	2-8-0	3-0-0
1822-23	3-0-0	2-8-0	3-0-0

Source: Proc. of B.O.T commercial, 29th June, 1827.

Table: 3.2: Average Weekly Wage of Cotton Spinners In The Manchester District

Year	Weekly Wages
1806	24s. 2d.
1810	30s. 2d.
1815	28s. 11d.
1819	27s. 1d.
1833	22s. 0d.
1841	21s. 7d.
1849	24s. 1d.

Source: Briggs, Economic History of England, p. 339.

From the Table 3.1 it is learnt that the wages of the spinners in Bengal was nearly Rs 3 per month on average till 1822-23. The Table 3.2 explicitly shows that in England till 1819, the average wage a spinner was 27s. 7d. per month or 12.73 Sa Rs (Exchange Rate between India and England was 2s. 2d. per Sa Rs in 1831-32 ⁹⁰). Here it is clear that wage rate in Bengal was much lower than that in England till 1819. From the Table 3.2, we see that in England the wages of the spinner started to fall around 1833.

In reply to the questions of the members of the select committee Montgomery Martin made the following observations on the spinning cost:

Mr. Hogg. - Have you examined the comparative prices of spinning cotton in India and in England?

Mr. Martin. - In the documents laid before Parliament in 1832-33, there is a calculation given of the cost of labour of producing yarns in Britain and in India for one pound weight, from No. 40 to 250, and likewise of the value of the labour and material combined. Now this shows the great advantage in the cost of labour that England has over India. It shows that on yarn No.40, the cotton costs in England 1s. 6d., and the labour 1s., making 2s. 6d; but in India the cotton costs 3d. and the labour 3s. 4d.; the cost is therefore 3s. 7d.; on the next yarn spun, where the cost of labour in England is 1s. 6d., in India it is 5s. 8.5d.; on the next yarn, where it is 2s. 2d. in England, it is 8s. 10.5d. in India: and in a similar manner the comparison proceeds through the different qualities of yarn, until upon yarn No.250, where the labour here is 31s., the labour in India is 83s. 4d.⁹¹

⁹⁰ *House of Commons* (P.P. 1831-32, vol. 10), p.385.

⁹¹ *House of Commons* (P.P. 1840, vol. 8), *Report from Select Committee on East India Produce together with the Minutes of Evidence, Appendix and Index*, p. 276.

From the description of Martin, we observe that around 1830 the spinning cost in England became lower than that of Bengal.

The productivity of the weavers in England was much higher than that of India. According to Martin, one weaver in England would produce more goods than six weavers in India.⁹²

The prices of different cotton goods in England had declined and became lower than that of Bengal in the first half of the nineteenth century. The following Table shows the prices of different piece goods in England and in Bengal in 1818.

Table: 3. 3: Comparative Prices of British and Bengal Piece Goods

Description of the Articles	Price Made in England	Price Made in Bengal
Doreas (20 yds. Piece)	55 Shilling	Dacca – 155 Shilling Keerpoy – 45 Shilling Hurripaul – 89 Shilling
Cossaes	60 Shilling	Malda & Dacca – 95 Shilling
Mulmuls	22 to 35 Shilling	Santipur – 47 to 76 Shilling Keerpoy – 39 Shilling
Nainsooks	33 Shilling	Keerpoy – 61 Shilling
Seerhand- connees	50 to 64 Shilling	Dacca and Santipore – 80 to 89 Shilling

Source: Amales Tripathi, Trade and Finance in the Bengal Presidency, p.165.

⁹² Ibid.

Table 3.3 shows that the prices of different English piece goods were lower than that of Bengal.

In this section we see that in the first half of the nineteenth century the prices of English cotton goods became lower than that of the Bengal products even though the wages of labourers still remained much lower in Bengal than their English counterparts. So, we may say that prices of English cotton goods reduced due to the high productivity and large scale factory production which were the fruits of Industrial Revolution in Great Britain. Here it is worth mentioning that the cheapest Hindu labour could not compete either in quality or quantity with Lancashire's mules or throstles.⁹³

III

In this section we compare the availability of raw cotton and its prices between England and Bengal in the period under review. The English cotton manufactures had to face stiff competition with the Bengal cotton manufacturers for a long period of time. The calicoes and muslins of Bengal successfully kept aside the British cotton goods in both home market of England and in the World market due to its singular beauty and endless varieties. In the first half of the nineteenth century, the English won the race and started to outclass the Bengal manufactures in their home as well as in the World market. Here, we analyze how far the raw cotton cost of production was responsible for the triumph of the English manufactures over the Bengal manufactures.

During the second half of the eighteenth century and by 1800, a new factory system of production grew in England. The textile merchants became wealthy men, and were able to build on their wealth the mills for cotton yarn and cloth. That time the

⁹³ Habakkuk, H.J. and Postan, M.M. (ed.), *The Cambridge Economic History of Europe*, Vol. 6, p. 275.

technological up-gradations in spinning as well as in weaving in England and the requirement of raw cotton increased by many times and the availability of raw cotton could have been a single limiting factor to production. But then the British set up colonies in those parts of the world which became the supplier of raw cotton to their industry. Raw cotton used to come easily from the American colonies. It was also grown and brought from India. About 77 per cent of the total import of raw cotton by England during 1815 – 59, was supplied by the USA.⁹⁴ Eli Whitney of America, in 1793, invented cotton gin.⁹⁵ Hodgen Holmes later in the same year modified and improved the Whitney's machine which was named as saw gin.⁹⁶ Application of saw gin resulted in many fold increase in the production of cotton in America. With the use of saw gin, the production of cotton was equivalent to 30,000 bales of 500 pounds each in 1798 as compared to an amount equivalent to 3,000 bales of 500 pounds each in 1790, when no such saw gins were in use.⁹⁷ Thus the British colonies became the exporter of raw cotton to England and importer of cotton goods from England. The following table shows the quantities of cotton imported into Great Britain from America alone.

Table: 3. 4: Quantities of cotton imported into Great Britain from America alone

Year	Quantities of Cotton Wool Imported into the U.K from U.S.A lbs	Year	Quantities of Cotton Wool Imported into the U.K from U.S.A lbs
1785	21,410	1801	18,283,511

⁹⁴ Farnie, D.A., op. cit., p. 15.

⁹⁵ Thompkins, D.A. The Cotton Industry, Publications of the American Economic Association, third series, vol. 5. No.1, Papers and Proceedings of the 6th Annual Meeting Part I. New Orlands, LA., Dec. 29 – 31, 1903 (Feb. 1904), pp. 144 – 153.

⁹⁶ Ibid.

⁹⁷ Ibid.

1786	3,178	1802	26,834,984
1787	48,800	1803	28,243,352
1788	245,919	1804	27,320,009
1789	476,557	1805	32,786,892
1790	350,105	1806	29,330,569
1791	35,906	1807	46,249,158
1792	88,676	1808	13,067,517
1793	189,250	1809	37,950,234
1794	278,897	1810	60,894,027
1795	1,146,349	1811	47,589,239
1796	3,656,488	1812	27,407,660
1797	3,253,019	1813	Records destroyed by fire
1798	6,051,314	1814	11,927,487
1799	7,430,924	1815	54,407,299
1800	15,048,186	1816	51,291,997
1817	60,695,293	1833	237,506,758
1818	68,217,656	1834	269,203,075
1819	62,412,654	1835	384,455,812

1820	89,999,174	1836	289,615,692
1821	93,470,745	1837	320,651,716
1822	101,031,766	1838	431,437,888
1823	142,532,112	1839	311,597,798
1824	92,187,662	1840	487,856,504
1825	139,908,699	1841	358,240,964
1826	130,858,203	1842	414,036,779
1827	216,924,812	1843	574,738,520
1828	151,752,289	1844	517,218,622
1829	157,187,396	1845	626,650,412
1830	210,885,358	1846	401,949,393
1831	219,333,628	1847	364,599,291
1832	219,756,753		

Table 3.4 Continued from page 71.

Source: House of Commons, P.P, 1847 – 48, Appendix No. 44, vol. 8, Part – II, p. 371.

From Table 3.4, we see that from 1784 to 1847 the raw cotton import from U.S.A gradually increased. It was only 21,410 lbs in 1785 and it reached up to 626,650,412 lbs in 1845. It slightly decreased to 364,599,291 lbs in 1847. Owing to Industrial Revolution, the Cotton Textile Industry of Great Britain experienced a remarkably high growth of production for which enormous quantities of raw cotton was required.

Due to this emergence and encouraged by the superior quality (which was resulted from stronger fibre and long staple), the British traders used to purchase large quantity of cotton from slave plantation in the U.S.A.

Now, let us consider the import of cotton into U.K from different parts of the World in the following table:

Table3.5: Quantities of Cotton Wool imported into the United Kingdom from different countries

Year	Brazil lbs	The Mediterranean lbs	British Possessions in the East Indies lbs	British West Indies lbs	Other Parts lbs
1815	13,104,267	30,466	7,175,243	15,341,197	10,650,674
1816	20,131,581	239,966	6,972,790	12,731,822	3,912,809
1817	16,338,861	44,532	31,007,570	9,743,605	8,473,828
1818	24,987,979	1,109,982	67,456,411	11,249,851	5,723,698
1819	20,860,865	486,864	58,856,261	7,050,753	1,785,757
1820	29,198,155	452,684	23,125,825	6,836,816	2040,001
1821	19,535,786	1,131,567	8,827,107	7,138,986	2,432,435
1822	24,705,206	518,804	4,554,225	10,295,114	1,732,513
1823	23,514,641	1,492,413	14,839,117	7,034,793	1,989,427
1824	24,849,552	8,699,924	6,420,005	6,269,306	953,673

1825	33,180,491	22,698,075	20,005,872	8,193,948	4,018,206
1826	9,871,092	10,308,617	20,985,135	4,751,070	833,284
1827	20,716,162	5,372,562	20,930,542	7,165,881	1,338,950
1828	29,143,279	7,039,7574	32,187,901	5,893,800	1,743,799
1829	28,878,386	6,049,597	24,857,800	4,640,414	1,153,818
1830	33,092,072	3,428,798	12,481,761	3,429,247	644,216
1831	31,695,761	8,460,559	25,805,153	2,401,685	978,067
1832	20,109,560	9,163,692	35,178,625	2,040,428	583,467
1833	28,463,821	1,020,268	32,755,164	2,084,862	1,825,904
1834	19,291,369	1,681,625	32,920,865	2,293,794	1,484,670
1835	24,986,409	8,451,636	41,429,011	1,815,270	2,564,831
1836	27,501,272	8,226,029	75,949,845	1,714,337	3,951,882
1837	20,904,145	9,326,979	51,532,072	1,595,702	3,240,169
1838	24,464,505	6,409,466	40,217,730	1,529,356	3,791,628
1839	16,971,979	6,429,671	47,172,939	1,248,164	5,976,008
1840	14,779,171	8,324,937	77,011,839	866,157	3,649,000
1841	16,671,348	9,097,186	97,388,153	1,533,197	5,061,513
1842	15,222,828	4,489,017	92,972,609	593,603	4,441,250

1843	18,675,123	9,674,076	65,709,729	1,260,444	sic
1844	21,084,744	12,406,327	88,639,776	sic	sic
1845	20,157,633	14,614,699	sic	sic	sic

Table 3.5 continued, from page 74.

Source: PPHC, 1847 – 48, Appendix No. 44, vol. 8, Part – II, p. 371.

From Table 3.5, we see that besides the U.S.A, a considerable quantity of raw cotton was imported from different countries of the world.

Bengal cotton textile industry at one point of time depended for its raw cotton on local production. Cotton was grown in many districts of Bengal. Colebrooke rightly mentioned that, in the province the entire amount of raw cotton required for her own cotton industry was at one time produced locally.⁹⁸ According to the estimate of James Grant, domestic production of cotton in Bengal was 100,000 maunds in 1786.⁹⁹ It increased to 156,000 maunds in 1791.¹⁰⁰ We see that during 1791 – 1861, the production of raw cotton decreased from 156,000 maunds to 110,000 maunds.¹⁰¹ Cotton cultivation and production were carried on in different parts of Bengal for meeting local demands only.

As the demand for cotton manufactures of Bengal increased to a large extent by the merchant companies of the foreign countries, the demand for raw cotton also increased many times. So, the Bengal industry had to depend on other provinces of India for raw cotton. Raw cotton was then started to be imported from Surat, Doab, Berar, and other parts of the Decan. According to the estimate given by Mr. Grant,

⁹⁸Colebrooke, *Remarks on the Husbandry and Internal Commerce of Bengal*, p. 84.

⁹⁹ Quoted in Ray, , *Identifying the woes of the cotton textile industry in Bengal*, *EHR*, 2009,p.22.

¹⁰⁰ Quoted in *ibid*.

¹⁰¹ Quoted in *ibid*.

during the first half of the eighteenth century, Bengal imported about 50,000 maunds per annum, which was nearly one-third of her yearly requirements.¹⁰² This import increased later and reached to 189,600 maunds in 1788-9 and 393,600 maunds in 1795-6.¹⁰³ About a decade later, the average import stood at 450,000 maunds annually, of which about 180,000 maunds and 270,000 maunds came from the Deccan and the Doab, respectively.¹⁰⁴

From the beginning of the nineteenth century, Bengal gradually became the exporter of raw cotton in England. Then raw cotton exported from the Bengal increased so considerably that it caused a scarcity of raw cotton for meeting the demand of her own industry. In 1816 – 17, the total export in private account was 6,20,263 maunds while in the period 1817 – 18 it was 9,68,020 maunds.¹⁰⁵

The following Table shows the value of raw cotton exported from Bengal to England and to other countries of the World.

Table 3.6: Value of raw cotton exported from Bengal to England and to other Countries of the World

Year	Exported to U.K S.R	Exported to World S.R
1823 – 24	4,51,021	23,47,568

¹⁰² Quoted in *ibid.*

¹⁰³ Quoted in *ibid.* p. 23.

¹⁰⁴ Quoted in *ibid.* p. 23.

¹⁰⁵ WBSA, *Proc. of Board of Customs, Salt and opium*, 6th Jan, 1826.

1824 – 25	5,01,779	32,28,335
1825 - 26	4,76,169	30,57,130

Source: Amales Tripathi, Trade and Finance in the Bengal Presidency, p.202.

The export of raw cotton from Bengal gradually increased. In between 1830 to 1840, the average quantity of cotton annually sent from Calcutta to the English market was 2,742,787 lbs.¹⁰⁶

The following Table shows the quantity of cotton imported into England from Bengal.

Table 3.7: Quantity of cotton imported into England from Bengal

Year	Total Quantity of Cotton Imported into England from Bengal lbs
1850	85,789
1851	1,175,940
1852	557,088
1853	7,660,242
1854	1,144,416

¹⁰⁶ Medicott, *Cotton Hand Book of Bengal*, p. 292.

1855	86,912
1856	1,418,928
1857	2,538,560
1858	190,400

Source: J. G. Medlicott, *Cotton Hand Book of Bengal*, p. 293

From the above Table 3.7 we see that from the third decade of Nineteenth century, Bengal was turned into an agricultural farm of England or the raw cotton supplier to the British cotton textile industry.

Now to compare the prices of raw cotton between England and Bengal cotton textile industry the Table given below may be taken into consideration.

Table 3.8: Comparative prices of raw cotton of England and Bengal

Year	In Calcutta	In Calcutta	In Liverpool
	Lowest d. per lb	Highest d. per lb	Average d. per lb
1755	10.03		
1790	2.14	2.52	21
1802			15
1813	3.90	6.00	15 $\frac{3}{4}$ - 19 $\frac{1}{4}$

1820	4.20	6.10	11 $\frac{3}{4}$
1826	4.95	5.70	9
1827	4.35		6
1829	3.30	4.20	5
1830	2.62	4.20	5 $\frac{3}{4}$
1831	2.25	4.15	5 $\frac{1}{4}$
1832	3.00	4.50	4 $\frac{3}{4}$
1833	3.60	4.40	7 $\frac{3}{4}$
1834	4.05	5.40	7 $\frac{1}{2}$
1835	4.20	4.68	8
1836	3.07	4.68	7 $\frac{3}{4}$
1838	3.15	4.65	5 $\frac{3}{4}$
1839	3.52	4.50	6 $\frac{3}{4}$
1840	3.00	4.50	5 $\frac{3}{4}$
1841	3.30	4.53	5 $\frac{1}{4}$
1842	2.77	3.90	4
1843	2.70	3.86	3 $\frac{3}{4}$
1844	2.47	3.56	4 $\frac{1}{4}$

1845	2.51	3.45	3 ¼
1846	2.47	3.60	4 ¾
1847	2.40	3.33	3 ¼
1848	2.55	3.45	3 ¼
1849	2.43	3.41	4 ¼
1850	2.55	3.86	5 ⅛
1851	2.51	3.87	4
1852	2.51	3.72	3 ¾
1853	2.36	3.22	3 ½
1854	2.46	3.37	3 ½
1855	2.74	3.26	3 ⅞
1856	2.85	3.30	4 ⅜
1857	2.85	4.50	5 ⅜
1858	5.10	6.15	4 ¾
1859	4.20	6.15	4 ¾
1860	4.05	4.50	

Table 3.8, Continued from page 79.

Source: Medlicott, Cotton Hand Book of Bengal, p. 289.

The Table 3.8 shows that the average price difference is insignificant between Bengal and England, rather the raw cotton price is lower in Bengal. So, from this we see that the price of raw cotton was not at all responsible for the lower price of finished products in England in their home and in the World market. Actually, high productivity growth in cotton textile industry owing to the Industrial Revolution in England was the important factor responsible for the disappearance of the Bengal cotton articles in the World market from the second half of the eighteenth century when the prices of similar cotton piece goods were lower in England than that in Bengal (from Table 3.3).

IV

Before the British rule in Bengal, the Hindu Kings and latter the Mughal emperors, their *Subadars* and the members of their noble court were great patrons of Bengal cotton manufactures. In those days the cotton textile industry of Bengal thrived under the state patronage and protection. When the British set their feet in Bengal, the cotton textile industry of Bengal was highly developed and the cotton goods of Bengal after meeting its domestic consumption were exported to the different parts of India and the World. Around 1615, the English East India Company started to trade in Bengal where the cotton manufacture was most important. They used to send the products to their home country as well as to the other parts of the World. From the second half of the seventeenth century, Bengal muslins and calicoes flooded in the market of Britain. By that time the English parliament gradually started giving different protections to their cotton textile industry just to save them from the stiff competition with the Bengal cotton manufactures. Besides, the British in Bengal used to apply many coercive or oppressive measures on the local weavers.

In this section we want to show how the protection to the cotton industry in England and the coercion on the Bengal weavers simultaneously made enough impetus to the triumph of the English industry over its nearest rival Bengal.

After the win in the Battle of Plassey in 1757 and asserting the political authority in Bengal, the English East India Company became the main purchaser of the Bengal cotton manufactures. Since then the English applied all possible measures to outclass other European or native traders from the business in Bengal. So, the English implemented a series of regulations in the second half of the eighteenth century. In spite of these, the English East India Company could not ensure monopoly in cotton trade in Bengal. The French and the Dutch company were the main rivals of the English. So, several foreign nations and indigenous merchants were engaged in considerable trade in Bengal cotton manufactures in the period under review despite the efforts made by the English Company to eliminate its potential competitors.

After 1757, the indigenous traders or '*dadni* merchants', for whom the weavers used to weave clothes, gradually disappeared from the investment business. Since then the English East India Company adopted the new system of advances under which the weavers were bound to give their entire produce to the company only. The company started to employ many '*gomostas*', '*paikars*' and '*dalals*' at every factory or *aurung* in order to impose strict control over the weavers. After the victory of Plassey the aim of the East India Company was to capture as much wealth as possible through internal and external trade in Bengal. According to Sinha, by 1780's the British made an attempt to create an Indian market for Bengal products and also for European imports. According to Sinha,¹⁰⁷ "The entire economy of Bengal was dominated by the needs of the European market in the 1760's, 1770's and 1780's". After 1757, the powerful Moghul domination in India came to an end and it was then replaced by the Maratha domination. The Marathas were averse to the luxurious mode of living like the Mughal. So, the demand for Bengal cotton goods had nearly disappeared in different provinces of India. According to Sinha, the British domination in Bengal and Maratha ascendancy in many other parts of India combined to bring about the steady decline of the flourishing Indian market for Bengal goods.¹⁰⁸

¹⁰⁷ Sinha, N.K., *The Economic History of Bengal*, vol. 1, p. 110.

¹⁰⁸ *ibid*, p. 111.

By capturing the economic as well as the administrative power of Bengal the English East India Company started to invest money to procure cotton goods. The company's method of investment was conducted by the Export Warehouse keeper and the company's servants at the subordinate factories. Many *aurung* or factory were established in different cotton manufacturing centres of the then Bengal for the procurement of goods. In an *aurung* one Resident or Company's European officer was appointed. He was the executive head of an *aurung* and under him one head *gomasta*, one *mohuree* or clerk, one cash keeper and some peons were posted. *Gomastas* used to give instruction to the *dalals* and *paikers* along with the weavers. When the weavers received money, they had to sign an agreement paper. According to Bolt, the *gomastas* made them sign a bond for the delivery of a certain quantity of goods within a certain period of time at a certain price and then only the weavers were given a part of the contract-money in advance. The asset of the poor weaver was in general not deemed necessary for the *gomastas* when employed on the Company's investment frequently made them sign what they pleased.¹⁰⁹

The woven cloths used to store in warehouse and every branch of cloth were marked by the producer or weaver's name. Here, on behalf of the *gomasta*, a person who was called *jassendar* or assorter was appointed to fix the price of each piece of cloth. Bolt describes that the roguery practiced in that department was beyond imagination, but all terminated in the defrauding the poor weaver; for the prices which the Company's *gomastas* and in confederacy with them, the *jassendars* fixed upon the goods in all places at least fifteen percent and in some cases forty percent less than the money the goods so manufactured could bring if they would have sold in the public bazaar or market without any restriction or compulsion.¹¹⁰ In this system the weavers were paid low price. So, they frequently resorted to selling their cloths to others, mostly to the Dutch and the French merchants. The company's *gomasta* used to punish the weavers for such practices. According to Bolt, at that time the English Company's *gomasta* set

¹⁰⁹ Bolts, W., *Considerations on Indian Affairs*, p. 193.

¹¹⁰ *Ibid*, p. 193.

his peons over the weavers to watch him and not infrequently to cut the piece out of the loom when nearly finished.¹¹¹ If a weaver was unwilling to engage himself in East India Company's business as he was not paid fair price from the Company, the force was applied on him mercilessly. In the letter of Nov. 11, 1768, the court of directors observed – "they (the weavers) are unwilling to engage in because we (the English Company) do not pay them a fair price. The gentlemen at Dacca say the foreigners give 20 or 30 percent more than we do but the fact that comes the strongest to the point is the sale of ferrit and damaged goods which sold at public auction from 10 to 100 percent advance, a clear proof of the injustice done to the weavers".¹¹² J. C. Sinha quoted the proceedings of April 12, 1773 which states that the two annexed papers which the President had formed from an examination into the complaint made to him by the weavers of Santipore and which he had every reason to believe to be authentic, would show the then miserable situation of the weavers, since it appeared that the prices given to them for the clothes provided on account of the Company's Investment, amounted to be no more and in some instances less than the cost of the materials and their labour was extracted from them without any repayment. They at the same time suffered the pain of corporal chastisement and were forbidden to work for private merchants or to make any other assortments but those ordered for the Company's investment. As a result they had no other means of living but by sinking a part of the advances made them in irrecoverable balances and by embezzlements and clandestine sales of their cloths to foreigners other than the British.¹¹³

The oppressions on the weaver can be understood by a letter date Nov. 11, 1768 where the court of Directors wrote that they could ascribe the Company's difficulties to nothing but the oppressed state the weavers had been in for some years, which had

¹¹¹ *ibid*, p. 193.

¹¹² Sinha, N. K. ed., *Fort William- India House Correspondence*, vol. 5, Letter to the court, 11th Nov., 1768, p.139.

¹¹³ Sinha, N.K. ed., *Fort William- India House Correspondence*, vol. 5, Letter to the court, 11th Nov., 1768, p.138.

occasioned many of them to fling up their looms.¹¹⁴ The price usually paid by the English East India Company to the weavers was arbitrarily fixed and was lower than the offered price of the other European rivals. So the Company forced the unwilling weavers to work for them. Besides this, the Company's *gomastas* used to abuse their power which was another mode of oppression on the weavers. Verelst observes that the *gomastas* or agents of the Company were necessarily entrusted with powers, which they frequently abused to their own emolument; and an authority given to enforce a just performance of engagements, became, notwithstanding the utmost vigilance of the higher servants, a source of new oppression.¹¹⁵

Due to the oppressions, a large number of weavers gave up their age old profession. Besides this, a great famine occurred in Bengal in 1770 which caused death of a large number of weavers and spinners. So, a crisis of weavers aroused in Bengal.

In 1773, Hastings declared the freedom of trade to the weavers. According to this proclamation, now a weaver got the liberty to engage himself to a business with any person or company.¹¹⁶ Then most of the weavers refused to make business contract with the English East India Company and even who received the company's advances, refused to deliver goods and disobeyed the whip of the Company's *gomastas*. To stop the audacity of the weavers, 'Coercive Regulations' were enacted in 1775.¹¹⁷ According to the 'Regulations' the weavers who used to take advances from the Company had to deliver goods accordingly; they had to deliver goods in time and they did not sell cloth to any other company. If a weaver disobeyed the above 'Regulations' he would be punished in a regular process in the Judicial Court.

¹¹⁴ Sinha, N.K. ed., Fort William- India House Correspondence, vol. 5, Letter to the court, 11th Nov., 1768, p.138.

¹¹⁵ Verelst, *A View of the Rise, Progress and Present State of the English Government in Bengal*, p. 85.

¹¹⁶ WBSA, *Proceedings of Board of Trade (Commercial)*, 9 May 1775.

¹¹⁷ WBSA, *Proceedings of Board of Trade (Commercial)*, 5 Sept. 1775.

Many measures were taken in between 1782 and 1787 to get the product in time and to stop open market selling by the weavers.

Though different Regulations were imposed by the English East India Company on the rival mercantile groups and gave utmost effort to eliminate them from competition, they did not succeed in true sense.

As per the Charter Act of 1793, the Company had to allow three thousand tons of shipping annually to the private merchants for their trade in the East.¹¹⁸ Unlike the period prior to 1793, the trade in cotton manufactures was now done both by the English East India Company and by the private traders. In the closing decade of the eighteenth century a large number of European private agency houses started their export trade from Bengal. One of the important items of their trade was cotton goods.

The coercion on the weavers and absence of any state protection in the period under review made it possible to displace the cotton weavers of Bengal and the glorious Bengal industry had started to ruin. The severity of oppression can be understood by “the story of weavers’ thumb” as described by J.C. Sinha.¹¹⁹ According to Sinha, there are two versions of the story. One is that the servants of the East India Company and their agents went to the length of cutting off the thumbs of weavers. The other is that the weavers themselves severed their own thumbs to avoid being forced to weave cotton items for the company. According to William Bolt, various and innumerable were the methods of oppressing the poor weavers, which were regularly practiced by the Company’s agents and *gomastas* in the country. Such modes of oppressions included fines, imprisonments, floggings, forcing bonds from them and because of that the number of weavers in the country had been greatly decreased. The severities practised towards those people were scarcely described, for it frequently happened,

¹¹⁸ Ghosal, H.R., ‘Cotton Industry in Bengal, Bihar and Orissa during the Early nineteenth Century’, *Journal of Indian History*, Aug., 1939, p. 206.

¹¹⁹ Sinha, J.C op cit ,p. 84.

opined Bolt in his observation.¹²⁰ The *gomastas* and other lower class servants used to take perquisites from the weavers which were quite unlawful.¹²¹ The Company's servant used to give whips on the weavers and if they failed to follow that they had to suffer from corporal punishment.¹²² The Commercial Residents were empowered to punish the 'acts of unwarrantable severity' but the ignorant weavers did not bring these incidents to the notice of the Resident and if they did the *gomastas* and other subordinates suppressed them.¹²³ Sometimes the weavers complained to the Board of Trade but in vain. At last when they became helpless they left their houses and looms to get relief.¹²⁴

Now, we want to describe the state protection to the cotton textile industry of England when the Bengal cotton industry faced various oppressions by the English East India Company. Since the last quarter of the seventeenth century, Bengal cotton goods had rapidly captured the English market for which the textile industry (mainly the woolen and silk) of United Kingdom had lost their market gradually at home. According to O'Brien, Griffiths and Hunt,¹²⁵ "England's native woolen and silk interests first became politically active against Asian textiles as early as the 1670s, but agitation to prohibit the consumption of imported calicoes and wrought silks only became serious in the mid 1690s". During 1696 - 1720, the structure of English legislation to regulate the entry of Asian clothes into the English market was important for the survival and long-term growth of the British domestic cotton industry.¹²⁶ To protect the infant

¹²⁰ Bolt, op cit, p. 74.

¹²¹ WBSA, *Proc. of B.O.T Commercial*, March 31, 1815.

¹²² WBSA, *Proc. of B.O.T Commercial*, May 8, 1818

¹²³ WBSA, *Proc. of B.O.T Commercial*, March 31, 1815.

¹²⁴ *Ibid.*

¹²⁵ O'Brien, Griffiths and Hunt, 'Political components of the industrial revolution: Parliament and the English cotton textile industry, 1660-1774', *Economic History Review*, 2nd series, vol. XLIV, 3, 1991, p. 401.

¹²⁶ *Ibid*, p. 401.

industry from the competition of Bengal cotton goods, the British Parliament from time to time enacted various Acts to prohibit the Indian cotton goods. It was started from 1700 with the Act prohibiting the use of painted, dyed or printed calicoes of India in England.¹²⁷ All such goods were imported for re-export only after the Act came into being.¹²⁸ White calicoes and muslin proper did not come under the purview of the abovementioned Act and were subjected to an import duty of 15% ad valorem.¹²⁹ After the enforcement of the Act, the import of white calicoes increased to a large extent which used to print in England. So, another prohibitive Act was passed in 1720 according to which the use of printed Indian calicoes whether printed in England or elsewhere were prohibited in England. In spite of all these, the export of cotton manufactures from Bengal as well as from India was not stunted. So, prior to the period under review the cotton industry of Bengal had been performing well.

After the Battle of Plassey the economic environment of Bengal started to be dominated by the whip of the British. The English East India Company acquired the 'Diwani of Bengal' in 1765. Since then the Indian cotton products imported to Great Britain had to pay an ad valorem duty of 45%, which exceeded by more than 100% than the duty on the raw materials imported from India.¹³⁰ Yet an additional duty of five per cent was imposed in 1779 on manufactures imported into England and a further five per cent was added in 1782.¹³¹ In 1783, to stop smuggling due to high tariff, the British Parliament replaced all previous duties upon muslin, unrated muslin and calicoes and imposed a single import duty of eighteen per cent ad valorem and

¹²⁷ Ray, , Identifying the woes of the cotton textile industry in Bengal, *EHR*, 2009, p.6.

¹²⁸ *ibid.*

¹²⁹ Sinha, J.C., *op cit*, p. 26.

¹³⁰ Hamilton, C. J., *Trade Relations between England and India*, pp. 107-8.

¹³¹ *ibid.*

ten per cent on re- export.¹³² From 1797 onwards, fresh duties were imposed by the British Parliament on articles imported into United Kingdom.¹³³ As shown in Table 3.9, we can infer that the duty gradually increased from 1802 and reached highest level in 1813. In 1813, the duty was about 44 per cent on muslins and around 85 per cent on calicoes.

The rates of duty per cent on Indian muslin, calicoes and on other cotton manufactures can be clearly understood from the following tables:

Table 3.9: The rates of duty per cent on Indian muslin, calicoes and on other cotton manufactures

Year	White Calicoes	Muslins and Nankeens
	£ s d	£ s d
1802	27 1 1	30 15 9
1803	59 1 3	30 18 9
1804	65 12 6	34 7 4
1805	66 18 9	35 1 3
1806	71 6 3	37 7 1
1809	71 13 4	37 6 8
1813	85 2 1	44 6 8
1814	67 10 1	37 10 0

¹³² Ibid, p. 162.

¹³³ Dutt, R., *The Economic History of India Under Early British Rule*, p. 293.

1819	67 10	37 10
1823	67 10	37 10
1824	67 10	37 10
1825	67 10	37 10
1826	10	10
1827	10	10
1828	10	10
1829	10	10
1830	10	10
1831	10	10
1832	10	10

Source: For the years 1802 - 14 from Baines, History of Cotton Manufactures in Great Britain, p. 76, 1819 - 1832 from HC, PP, 1831-32, vol. 10 , part II, appendix 5, p.594.

From the above table, it is observed that since the early nineteenth century, the rates of duty on Indian muslins and calicoes gradually increased. In 1802, the British Parliament imposed around twenty seven per cent and around thirty per cent ad valorem duty respectively on the muslins and white calicoes of Bengal. The duties gradually increased and reached maximum in 1813. In 1813, the ad valorem duty on white calicoes reached around eighty five per cent which was around forty four per cent on muslins. In 1824, the duties were reduced to sixty seven per cent on white calicoes and thirty seven per cent on muslins. Until 1825, the duty remained more than sixty per cent on the white calicoes and more than thirty per cent on the muslins. In 1826, the duty was drastically reduced to ten per cent ad valorem on calicoes and on muslins and since 1826, the tariff rates were reduced. By 1826, the English cotton

goods were able to successfully outclass the Indian cotton goods in the World market as well as in their home market.

Once Montgomery Martin replied to the questions of the members of a select committee where the Hindus of Calcutta complained that every encouragement was held out to the exportation from England to India of the growth and produce of foreign as well as of English industry, while many thousands of the natives of India, who, only a few years before, had earned their livelihood by growing cotton, and by manufacturing cotton goods, were then without bread, in consequence of the facilities that had been afforded to the produce of America, and also to the manufacturing industry of England. He also mentioned that by the exportation of their steam-power based manufactures to India, the British not only supplanted the native manufacture, but also the spinner of the twist and the grower of the cotton. The decay and destruction of Surat, Dhaka, Murshidabad, and of other places, where native manufactures were carried on, were, in fact, very unfortunate. Martin was not ready to consider that as a fair practice of trade; he thought it had been the power of the stronger exercised over the weaker, and it would have been for the stronger's interest. On moral grounds, Martin was in favour of imposing the British duty, to be levied at the same rate as in India on British manufactures as had been levied in England on Indian manufactures.¹³⁴

Martin observed that the high rate of duty was imposed on Indian cotton manufactures while it was imported into England; on the other hand, the British cotton goods were exported into India at a low rate of duty. Thus the British cotton manufacturers in Glasgow and Manchester had supplanted the Indian native manufacturers from the market of India and abroad.¹³⁵

Martin also observed that England had evidently nothing to be afraid of competition with the Hindu labourers. If England had acted with justice and admitted the cotton

¹³⁴ *House of Commons* (P.P. 1840, vol. 8), p. 275.

¹³⁵ *ibid.*

manufacturers of British India on the same terms upon which the cotton manufacturers of England were admitted to British India, then the unjust treatment for a quarter of a century might have been compensated or avoided.¹³⁶

Bengal cotton textile industry was not highly affected by the high tariff policy although it checked the importation of Bengal cotton manufactures into Great Britain only. The British Parliament started to impose tariff and prohibition of Indian cotton goods in English market as early as 1700. Since then after a century hence i.e. up to the second decade of the nineteenth century, the export of Bengal cotton goods was considerable. But when the English cotton textile industry became highly developed, its high productivity and large scale production caused the decrease of the price of their cotton products, the export of Bengal cotton products was on the wane. Besides these, the cotton goods of England since the first half of the eighteenth century started to be long lasting and handy for use. This was why cotton goods of England successfully outclassed the Bengal cotton goods in the World market as well as in the indigenous market of India.

V

The facts described in this chapter show that the period under review represented economically an important phase when the Industrial Revolution caused a drastic change of the production system in England whereas Bengal industries still followed the traditional age old system of production. In this period a gradual recession of the cotton industry of Bengal occurred and the cotton industry of England emerged as the leader in the global market.

Here we have analyzed the various techno-economic factors which should be judged to find out the main cause for the triumph of English cotton goods over the Bengal muslin and calicoes. We have discussed about four factors viz. technological

¹³⁶ *ibid.*

innovation, labour cost of production, supply of raw material and economic environment.

When we consider the labour cost of production, we see that after the Industrial Revolution the labour cost in England became lower than that of Bengal although the wage rate was very high in England.

When we consider the raw cotton of production there is hardly enough evidence available that can certainly show that the price or the supply of raw cotton was responsible for the triumph of the cotton goods of England over the Bengal cotton goods.

When we describe the oppression on Bengal weavers in the one hand and tariff protection to English cotton industry on the other, we see that after tariff policy and oppression the Bengal cotton textile industry maintained its buoyant position for more than a hundred years. So, this factor was not that much significant.

Among the factors mentioned above, the technological innovation was so far the most powerful one. That the oppression and prohibitive tariffs were the leading factors behind the competition among the two production centres of the world were some sort of baseless notions. However, these certainly had some detrimental effects on the cotton industry of Bengal. The point is that even if there had been no hostile tariffs and no oppression, the downfall of the Bengal industry could not have been prevented long on account of the mighty force set in motion by the mechanical revolution. It was Industrial Revolution that enabled England to supplant the Bengal cotton products not only outside, but within our own country itself. Inventions of power driven machineries made it possible for the British industry to produce muslin and calicoes in imitation of the Bengal products at such low prices as to outclass Bengal cotton goods of same qualities.

Chapter-IV

Chapter-IV

Status of the Industry in Birbhum, Burdwan, and Hooghly during 1757-1857

The three districts, viz, Birbhum, Burdwan and Hooghly are the districts under the jurisdiction of Burdwan Division. In the period under review the three districts were primarily agricultural districts with a large percentage of the population being dependent on agriculture. But rural manufacture and industry grew as an adjunct to agriculture.

In Birbhum district, cotton cloth, silk cloth, sugar, lac bracelet, stick-lac, brass-ware and iron-ware were produced. Silk was woven at Baswa, Bishnupur, Karidha and Tantipara and at Gunutia there existed a silk factory of the East India Company. Brass-ware was manufactured at Dubrajpur, Tikarbetha, Ilam Bazar, Hazratpur and Nalhati. Iron-ware was manufactured at Dubrajpur, Kharun, Lokpur, Rajnagar and Rampur Hat. Lac bracelets and stick-lac were manufactured at Ilam Bazar and Surul. Besides, the East India Company had a sugar factory at Surual. Beside these, Birbhum was well known for its lac-rearing industry, manufacture of indigo, iron and shellac.

Silk and cotton weaving were the important industries of the Burdwan district. Beside these, brass utensils, cutlery, indigo, shellac and lac dye were manufactured in the district. Radhakantpur and Memari were the important centres for silk weaving. Brass-ware was manufactured at Dainhat, Begunkhola and Banpas. Cutlery was made in Burdwan town and Shellac and lac dye were manufactured at Dignagar.

In Hooghly district, the main manufactures were cotton and silk clothes. The other manufactures were brass and bell-metal utensils, jute and hemp rope and gunny clothes. At Serampore silks were dyed and color-printed. Gunny cloth was manufactured at Balughat. Jute and hemp ropes were produced at Chatra, Sankarpur, Nabagram and Khalsini. Brass and bell-metal utensils were manufactured at Bansbaria and Kamarpara.

Among the above products of the three districts, cotton piece-goods formed by far the most widely manufactured article. When the European traders had come to the districts new markets and trade circuits opened up. The entry of the European merchant capital into the districts enhanced to a great extent the productive potentialities of the rural cotton industry. A growing market in abroad, particularly in the United Kingdom and Europe led to a large increase in the production of cotton piece-goods of the districts. The cotton industry of the districts grew rapidly due to extensive export trade by the British East India Company in the period under review.

With this background, this chapter will seek to review the status of the cotton industry in the districts of Birbhum, Burdwan and Hooghly during 1757-1857. There will be six sections in this chapter. Section one discusses the different places of the districts where the cotton industry was concentrated. Section two describes the organization of the factories and the procurement process of the East India Company. Section three describes the income of the persons associated with the production, the production cost, and the price of the products. Section four concentrates on raw cotton production in the districts. The number of people employed in the districts' industry has been discussed in section five. The Section six is a concluding part.

I

Since the beginning of the seventeenth century, the European traders carried on extensive business in Bengal. The Portuguese were the first settlers in Bengal. They settled at Chittagong, Satgaon and Hooghly. Around 1530, they established Porto Granda (big Port) at Chittagong and established Porto Piqueno (small port) at Satgaon. They founded the town of Hooghly-Chuchura in 1579. They dominated Bengal trade till the end of the seventeenth century. Beside the Portuguese, the Dutch, the English, the French and the Danes were the other European traders in Bengal in seventeenth century. To procure cotton goods from Bengal, the European traders established factories in all the important cotton manufacturing centres. The Dutch had factories at Chinsura and Cassimbazar. They founded the Chuchura factory in 1656. By the beginning of the eighteenth century, more than half of the total value of textiles the Dutch exported from Asia was in the form of Bengal textile.¹³⁷ The French began their trade in Bengal as early as in 1674. They came to Chandernagore, as also to Bengal, for the first time in 1673. They established factories in some commercial centres, like Chandernagore, Cassimbazar, Saydabad (near Cassimbazar), Jugdea, Dhaka, Supur, Khirpai, Mohanpur, Chittagong and Maldah. Like other Europeans, the Danes built a factory in Hooghli in 1676, and their business was confined there. But their relation with the then Government of Bengal was very bitter, and they were virtually forced to shut down their business in Hooghli in 1714. Around 1755, the Danes re-established themselves at Serampore and their business was not significant. The English trade in Bengal started since 1633. They founded the Hooghly factory in 1651. Their Dacca factory was founded in 1660.

In the first four decades of the eighteenth century, the British East India Company gradually reinforced their strong hold on Bengal trade. They achieved an imperial *farman* from the Mughal emperor Farrukhsiyar in 1717 for duty-free trade on payment of Rs 3,000 per annum. Since then a significant development of the

¹³⁷ Chaudhury, S., *From Prosperity to Decline*, p.29.

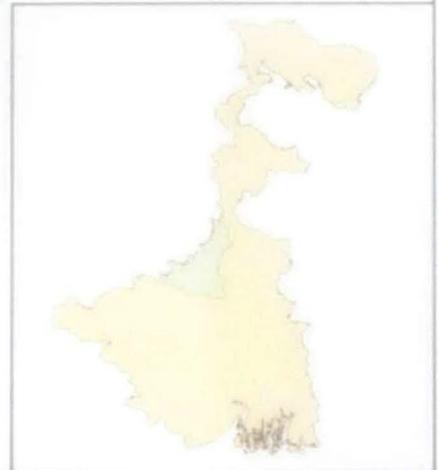
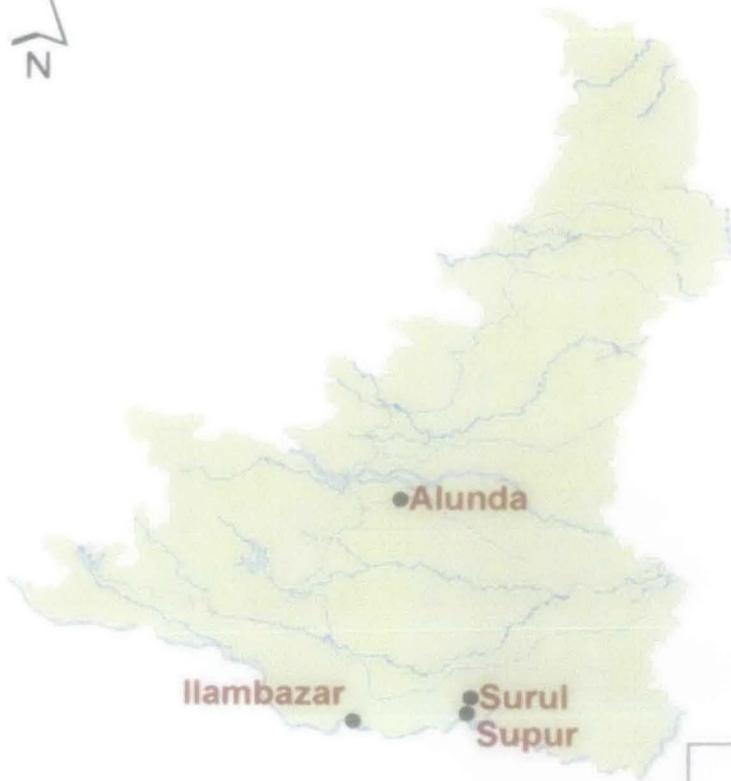
Company's trade in Bengal took place. They took the administrative and economic power of Bengal after the Battle of Plassey, and after that they started to successfully outclass the other Europeans, as well as the indigenous traders from Bengal.

The British Supremacy in trade in Bengal enabled the English East India Company to establish many factories in different manufacturing centres of cotton piece-goods in Bengal. Since then, the cotton piece-goods of the districts formed the principal stuff of export by the British East India Company, and the Company built up different factories or *aurungs* to procure piece goods in different production centres of the three districts. The important *aurungs* of the districts were Haripal (in the Hooghly district), Gollogore (in the Hooghly district), Katwa (in the Burdwan district), Soonamooky (in the Bankura district). The Company also had subordinate factories under an *aurung*. Since the foundation of Sonamukhi Factory in 1783, it had been the head factory of Somanukhi Commercial Residency with many subordinate *aurungs* spread over the districts of Birbhum and Burdwan.¹³⁸

The following maps show the location of the British factories in the three districts for the procurement of cotton piece goods in the period under review.

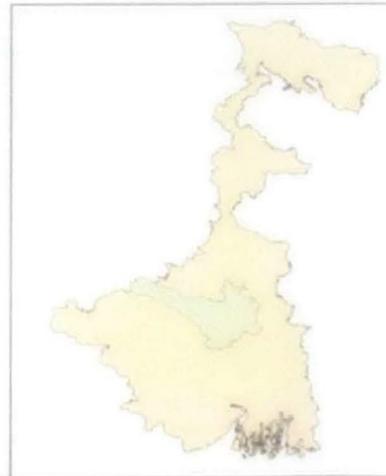
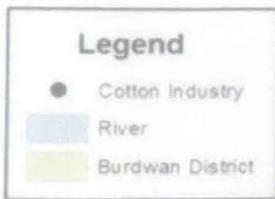
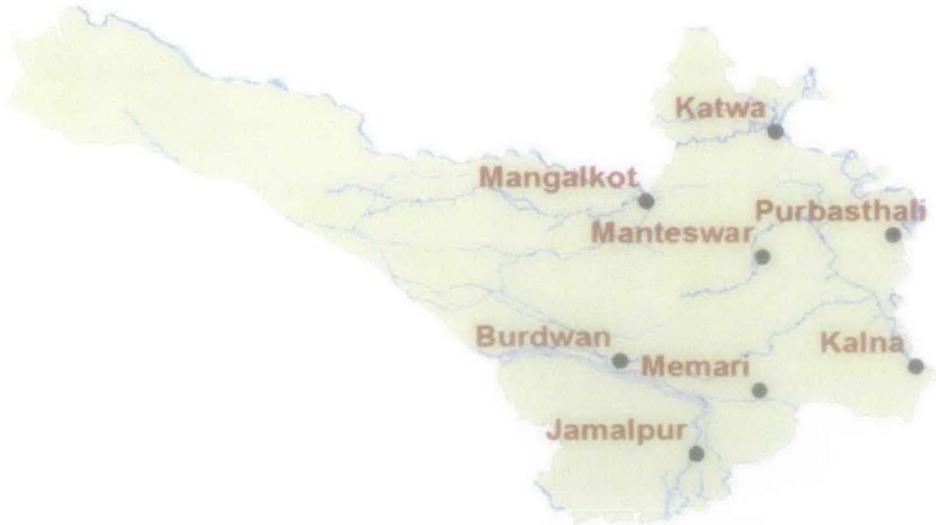
¹³⁸ O'Malley, L.S.S., *Bengal District Gazetteers Birbhum*, P. 23.

Cotton Manufacturing Centres, 1757 - 1857 (Birbhum District)



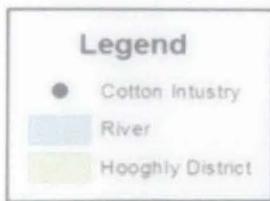
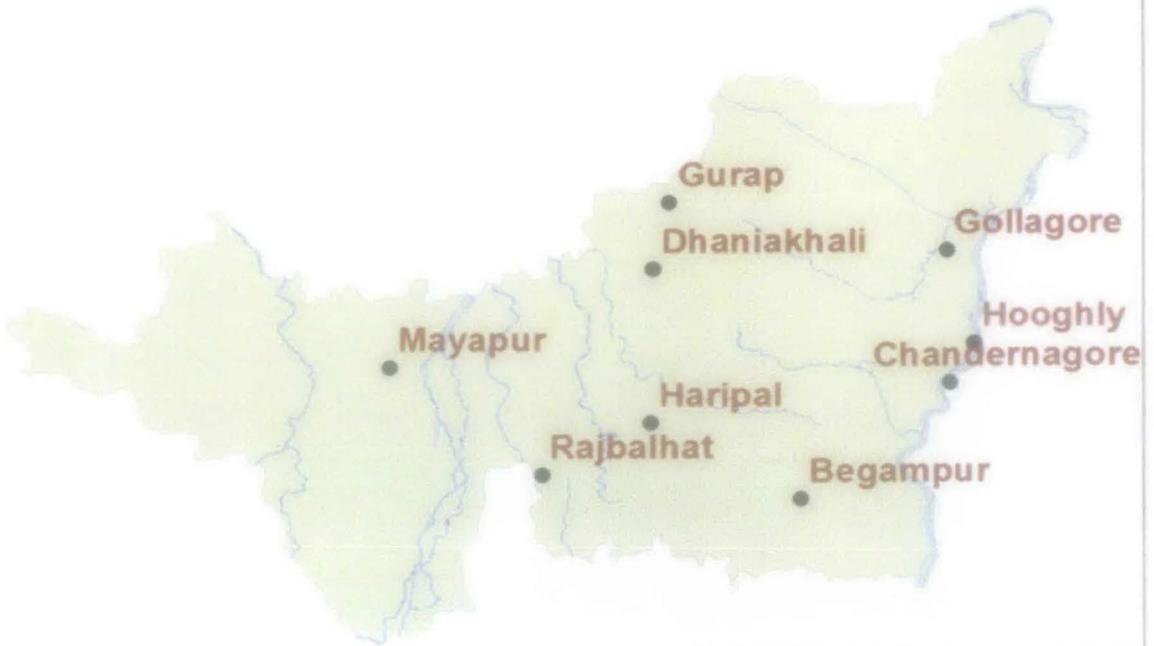
**STATUS OF THE COTTON TEXTILE INDUSTRY IN BIRBHUM,
BURDWAN AND HOOGHLY DISTRICTS OF BURDWAN
DIVISION DURING 1757 -1857: A CRITICAL OVERVIEW**

Cotton Manufacturing Centres, 1757 - 1857 (Burdwan District)



**STATUS OF THE COTTON TEXTILE INDUSTRY IN BIRBHUM,
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Cotton Manufacturing Centres, 1757 - 1857 (Hooghly District)



**STATUS OF THE COTTON TEXTILE INDUSTRY IN BIRBHUM,
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DIVISION DURING 1757 -1857: A CRITICAL OVERVIEW**

In the district of Birbhum the production of cotton cloth was concentrated in Supur, Alunda, Ilambazar and Surul. However, a report from the Danish factory in Serampore shows that the district was almost solely inhabited by the weavers.¹³⁹ Supur was a small village which was located at a distance of 14 km from Bolpur on the bank of river Ajoy. In eighteenth century, beside the English, the French traders also established their base at the site. In the year 1768, the French gentleman Mon. Le Seigneur came into Birbhum and built a factory at Supur where he hoisted the French colours, appointed guards and made advances for *garhas* (cotton cloth) through *dalals* to the amount of Rs. 1,25,000 annually.¹⁴⁰ Some time about the year 1774 he left the factory and from the period of his departure no advances were made under the sanction of the French name.¹⁴¹ Alunda was a village under Suri sub-division which was located at the south-eastern part of the district on the bank of the Ajoy River. The principal industries of the village were cotton and silk weaving. Another important village under the Suri sub-division was Ilam Bazar which was also located on the bank of the Ajoy River. It was a considerable trade centre and was celebrated for its manufacture of cotton piece-goods. Surul was a village in the neighbourhood of Santiniketan under the Suri sub-division which was located about five miles north of the Ajoy River. The cloth factory of the English Company here was known as *Bara Kothi* (bigger factory) within the commercial residency of Sonamukhi.¹⁴²

In Burdwan district, the cotton manufactures were concentrated in Burdwan town and villages within the radius of twenty mile with Katwa as centre.¹⁴³ Katwa and its surrounding villages were situated between the Ajoy River and the Hooghly River in the North-eastern part of the district, and were famous for cotton textile production.

¹³⁹ Feldback, Ole, 'Cloth Production and Trade in Late Eighteenth Century Bengal' *Bengal Past and Present*, , vol. 86, 1967, p. 130.

¹⁴⁰ O'Malley, op. cit., p. 27.

¹⁴¹ *ibid.*

¹⁴² Mitra, G., *Birbhumer Itihas*, vol.II, p. 128.

¹⁴³ Quoted in Chaudhury, S. op. cit., p.136.

In 1810, as the return of investment of English East India Company 8,160 pieces of cotton piece-goods were sent to the Export Ware House of the Company from this *aurung*.¹⁴⁴ Cotton carpets were manufactured in Burdwan Town.¹⁴⁵ The centres of the cotton industry in the district were Purbasthali, Kalna, Manteswar, Memari, Jamalpur, Mundalghat. Purbasthali was a village and a cotton manufacturing centre under the Katwa *aurung*. It was located at the south-eastern part of the Katwa *aurung* and at a distance of 32 km or 20 mile from Katwa town. Manteswar was a village and also a cotton manufacturing centre under the Katwa *aurung*. It was located at the south-western part of the Katwa *aurung*, and at a distance of 32 km or 20 mile from Katwa town. Kalna was located at a distance of 60 km from Katwa, and was famous for cotton manufactures. Memari was located at a distance of 28 km from Burdwan town. It was famous for the manufacture of silk and cotton *sarees* and *dhoties*.¹⁴⁶ Jamalpur was a village near Memari and was an important cotton manufacturing centre. Mundalghat was a famous cotton manufacturing *aurung* of the English Company. Here, in 1793 the investment for cotton piece-goods of the Company was C. Rs 2,02,407.¹⁴⁷

In the district of Hooghly, the cotton industry veered around Haripal, Durhatta, Dhaniakhaliu, Mayapore, Chandoolea, Khursurroy.¹⁴⁸ Beside these places, Gollagore, Gaulpore, Khawnpore, Gurup, Mazenan, Hooghly, Barnagore, Farashdanga (Chandernagore) were also famous for cotton manufactures.¹⁴⁹ Haripal was located at a distance of 34 km towards west from Hooghly-Chuchura and close to the Hindu shrine of Tarakeshwar. In 1810, as the return of investment of English East India

¹⁴⁴ WBSA, *Proceedings of Board of Trade* (Commercial), 18 May 1810.

¹⁴⁵ Imperial Gazetteer of India, vol. I, p. 272.

¹⁴⁶ *ibid.*

¹⁴⁷ WBSA, *Proceedings of Board of Trade* (Commercial), 29 Nov. 1792.

¹⁴⁸ WBSA, *Proceedings of Board of Trade* (Commercial), 8 March 1808.

¹⁴⁹ WBSA, *Proceedings of Board of Trade* (Commercial), 29 May 1808.

Company 3900 pieces of cotton piece-goods were sent to the Export Ware House of the Company from this *aurung*.¹⁵⁰ Gollagore was an important *aurung* of the district. In 1810, as the return of investment of English East India Company 26,290 pieces of cotton piece-goods were sent to the Export Ware House of the Company from this *aurung*.¹⁵¹

In Burdwan district, different types of clothes were produced: *nyansooks*(soothing to the eyes), *mulmuls*(fine soft cotton muslin), *seerbati*(semitransparent like sherbet), *dooreans*(striped cloth), *terrاندams*(clinging to the body), *cutanies*, *soosies*(a kind of fine coloured cotton cloth), *garah*, *guzzy* and *doosootas*. While the *garah*, *guzzy* and *doosootas* were coarse varieties, the remaining were fine varieties of cloth. *Nyansook* was thick muslin, apparently identical with the fabric called *tunsook* in the Ain-i-Akbari of Abul Fazl and the price of which was Rs. 80 per piece. The dimension of *nyansook* cloth was 10 to 24 yards by 1 yard. *mulmul* was the best quality muslin. The number of threads in the warp in *mulmul* was 1800 to 2000. *Terrاندam* was used for the making of shirts. The dimension of *terrاندam* cloth was 20 yards by 1 yard. *Seerbati* was worn as a turban. The dimension of *seerbati* cloth was 20 to 25 yards by ½ yards.

The district of Birbhum was popular for its *garha* production. Three sorts of *garha*, namely, fine, middling and coarse were produced in the district. According to the Danish report, in the late eighteenth century the average annual production of Birbhum *garhas* was estimated at 400,000 pieces of which 160,000 pieces were annually exported on average to Europe.¹⁵² Beside *garah*, *dhoti* (men's cloth), *chadar* (wrapper), *ganji* (vest) were also produced in the district which were used by the indigenous people.

¹⁵⁰ WBSA, *Proceedings of Board of Trade* (Commercial), 18 May 1810.

¹⁵¹ *ibid.*

¹⁵² Feldback, Ole, *op. cit.*, p. 127.

The district of Hooghly had long been noted for the production of plain white muslins and different types of calicoes. The muslin of this district was *khasa* ordinary, *mulmul* ordinary and *duriyas* where as the calicoes were *bethilas* (fine calico) and *chowtars* (fine calico). A large volume of cotton piece-goods of Hooghly district was exported by the European traders since the middle of the eighteenth century. In the mid-eighteenth century the Dutch and the English companies exported more than fifty per cent of the total value of their textiles from the Hooghly area.¹⁵³

II

From above, we see that the British East India Company built up different factories or *aurungs* to procure piece goods in different production centres of the three districts. The chiefs and the subordinate officers of the factories used to work under the full control of the Council in Calcutta. According to the order of the Council on the 29th July, 1745, no factory could employ any Indian as a servant of the factory, although they could do any private work of the factory.¹⁵⁴ The Chiefs of the factories and their assistants used to draw small salaries and they were allowed to carry on private trade which used to give them handsome profits.¹⁵⁵ Some soldiers and *sepoys* were appointed in each factory to guard the factory and escort the products from the production centres to the factory and thence to Calcutta.¹⁵⁶ The list of merchants, *gomastas* and all others who were engaged by the factories should be duly forwarded to the Council.¹⁵⁷ The Council used to inspect the products which were supplied by the factories. The council also demanded explanations about the products from the chiefs of the factories if they supplied products of inferior quality, and even these inferior products were sometimes returned back to the Factories with strong orders

¹⁵³ Chaudhury, s., op.cit., p.208.

¹⁵⁴ Quoted in Datta, K.K., *Alivardi and his times*, Letter to Court, 4th Feb., 1746, para. 18, p.190.

¹⁵⁵ Taylor, *A Sketch of the Topography and Statistics of Dacca*, p.87.

¹⁵⁶ *ibid.*

¹⁵⁷ Quoted in Datta, op. cit., Letter to Court, 4th Feb., 1746.

and instructions to improve the quality of products in the future. On the 25th February, 1753, the Council returned a parcel of clothes which was sent by the Dacca factory because the clothes in the parcel had not been properly dressed.¹⁵⁸

The advances made by the company's factories to procure goods were called by the company's investment. The Council in Calcutta used to prepare a list of investment in each year for the factories and the listed investment or money was sent to each factory usually in the beginning of each year.¹⁵⁹ The Council also used to send the Masters (samples) of cotton piece-goods to the factories according to which piece-goods were purchased by the factories. The factories of the English Company procured goods through merchants who used to receive *dadni* or advance money. The weavers were directly paid advances later on. The advances of the Company were made on the basis of prior right of the goods for which they contracted the weavers.

The piece goods of the districts' factories were sent to the export ware house first and then were exported to the European market. The investment in different *aurungs* and their sub-ordinate factories of the districts gives us an idea of the quantity of cotton goods production in those districts. The following table shows the investment list of 1793 where the price shows the quality.

¹⁵⁸ *Ibid.*, Letter to Court, 4th January, 1754, para. 77.

¹⁵⁹ *Ibid.*, Letter to Court, 19th Feb, 1741, para.17 and 18, p.189.

Table – 4.1: Investment list of 1793 of the English East India Company in different *aurungs* of the districts

	Quantity Pieces	Price C.Rs.
Haripal and Katwa	52,950	4,70,631
Soonamooky	59,800	3,23,454
Mundalghat	31,800	2,02,407
Gollagore and Barnagore	71,700	5,29,601

Source: Quoted in Sinha, N.K., *Economic History of Bengal*, Proc. B.O.T Comm.
29 Nov., 1792, p. 178.

The production of cotton piece goods in different *aurungs* of the districts can be shown by the following tables which show the investment of English East India Company in different years.

Table 4.2: Investment of English East India Company in different years in Gollagore and Haripal *aurung*

Year	Gollagore Investment Sicca Rupees	Haripal Investment Sicca Rupees
1776-77	53,879.31	N A
1780-81	1,46,870.69	4,52,394.83
1787-88	2,04,556.036	2,56,250.001
1793	5,29,601	4,70,631(Katwa included)
1798	4,88,953.2	2,52,419.2
1810	28,730.23	17,135.25
1816	2,452.44	1,324.13
1817	3,04,407	1,19,562
1821	35,268.27	35,145.416
1824	53,400 (Santipur included)	1,276.10
1828	27,000 (Santipur & Barnagore included)	695.8

N A: not available

Source: Proc. B.O.T. Comm. 18 Jan. 1776. Proc. B.O.T. Comm.20 Feb. 1782 Proc. B.O.T. Comm.26 Feb. 1790. 1793, from N. K. Sinha, *Economic History of Bengal*, p. 178. 1798, Proc. B.O.T. Comm.13 Mar. 1798. 1810, Proc. B.O.T. Comm.11 May 1810. 1816, Proc. B.O.T. Comm.5 Sept. 1817. 1817, Proc. B.O.T. Comm.10 May 1817. 1821, Proc. B.O.T. Comm. 19 Feb. 1822 & 22 Feb. 1822. 1824, Proc. B.O.T. Comm.26 Feb. 1790. Proc. B.O.T. Comm. 4Jan. 1825. 1828, Proc. B.O.T. Comm.22 Feb. 1828 & 22 Jan. 1828.

Table 4.3: Investment of English East India Company in different years in Sonamooky *aurung*

Year	Sonamooky Investment Sicca Rupees
1793	3,23,454
1798	2,94,244.16
1810	15,443.56
1815	97,150
1819	11,070
1821	7,340.10
1824	185.62
1827	2.72

Source: 1793: Proc. B.O.T Comm., Nov. 29, 1792. 1798: Proc. B.O.T Comm., Mar. 13, 1798, 1810: Proc. B.O.T Comm., May 11, 1810, 1815: Feb. 16, 1815 1819: Proc. B.O.T Comm., Feb 12, 1819. 1821: Proc. B.O.T Comm., 19 Feb., 1822. 1824: Proc. B.O.T Comm., 10 Feb., 1824. 1827: Proc. B.O.T Comm., 12 Jan, 1827

Table 4.4: Investment of English East India Company in different years in Katwa
aurung

Year	Katwa Sicca Rupees
1776-77	21,551.72
1793	4,70,631(Haripal included)
1798	2,20,422.4
1810	17,958.27
1819	6523.2

Source: 1776-77: Proc. B.O.T. Comm. 18 Jan, 1776, 1793: Proc. B.O.T Comm., Nov. 29, 1792. 1798: Proc. B.O.T Comm., Mar. 13, 1798, 1810: Proc. B.O.T Comm., May 11, 1810, 1819: Proc. B.O.T Comm., Sept.5, 1819.

The table 2, table 3, and table 4 exhibit the prosperity of the cotton industry of the districts in the second half of the eighteenth century as well as its decline in the first quarter of nineteenth century.

The English Company in case of '*dadni* merchants' always tried to maintain a strict control over the merchants. The merchants had to give securities to get '*dadni*'. They were warned against supplying clothes of inferior quality and sometimes even exacted penalties from them if they failed to supply goods in time and in appropriate quality according to their contract.¹⁶⁰ At that time, the other European traders also procured the cotton piece goods by the same *dadni* merchants.

¹⁶⁰ Quoted in Datta, K.K., *Studies in the history of the Bengal Subah*, p. 116, Letter to Court, 30th Nov., 1746, para. 9.

The English East India Company used to procure cotton goods by means of contract with the native *dadni* merchants. A Danish Report shows that the Birbhum *garhas* were procured in this way.¹⁶¹ The merchants made advances to the weavers. The weavers were registered to work for the Company and committed to supply goods at a price which was lower than the market price. The registered Company weavers were not allowed to work for others as long as their contract period was not over. The native merchants used to exact 2 to 3 rupees and more from each weaver as *selami* or 'respect money'. In Birbhum district a native merchant who had contract with the English Company for the supply of the *garhas* earned Rs 16,000 to Rs 20,000 as '*salami*' (respect money).¹⁶² The Company's support and protection to the merchants helped them to practise such illegalities.

The *dadni* merchants very often could not maintain their contracts, and since 1746, the English Company tried to procure goods by ready money. But the merchants were not interested in this system. Because most merchants used to operate on a large scale and used to place orders and lay out part of the purchase price before the beginning of production where further payments used to be offered just before the end of the production. So, in the system of advance payment to the weavers, the merchants used to have full control over the quantity, quality, and price of products. In this new system the merchants had low control over prices and quality of product. So, the merchants did not fulfill their commitment to the English Company. The Company suffered from the uncertainty to procure goods in expected quantity, quality and in expected time. So, this system did not last for long.

Since 1753 the method of 'investment' through *dadni* merchants was completely abolished. Because, despite all help from the Company the *dadni* merchants often failed to fulfill their commitments. At this time the English Company had switched over to the system of purchase through the Commercial Resident instead of native

¹⁶¹ Feldback, Ole, op. cit., p. 130.

¹⁶² *ibid*, p.131.

dadni merchants.¹⁶³ Since then, the East India Company introduced the practice of getting the goods directly from the *aurungs* through '*gomastas*' or native agents.¹⁶⁴

So, during the period under review, the *dadni* merchants disappeared from 'investment' business of Bengal and the English East India Company introduced the new method of engaging the weavers to work on a system of advances where the weavers were bound to give their total produce to the Company. At this time a large number of *gomastas* were employed at every *aurang* or factory. One head *gomasta*, one *mohuree* or clerk, one cash keeper and some *tagaders* (peons) were posted for an *aurung*. The *gomasta* gave direction to the weavers. They used to control the weavers and compel them to follow the contracts strictly. Here, the English East India Company's investment in different cotton manufacturing centres was carried on through the Export Warehouse Keeper. A Commercial Resident was appointed for one or more *aurungs* as the chief executive of the investment business of the company. For example, R. W. Cox, John Cheap and Thomas Philpot were the Commercial Residents of the Gollagore, Sonamookhy and Haripal factory respectively. The Commercial Residents were directly subordinate to the board of trade at the headquarters. A Commercial Resident was in charge for the management of a commercial residency which contained a head factory with a number of subordinate *aurungs*.

In this new system the *gomastas* used to play vital role in procurement. They had good knowledge about the weavers' capacity and specialty of their production. In some particular months they used to appear in the weavers' hamlets to distribute advances. He would be accompanied by a *mohure*, a cashier, three or four *tagadeers* and some *paiks* (armed guards) to enforce his order. The *gomasta* used to appoint some *dalal* (sub-agents) for the successful operation of the procurement. These *dalals* used to watch on the weavers so that they could not misuse the advanced money or

¹⁶³ *ibid*, p. 131.

¹⁶⁴ Quoted in Datta, K.K., *Studies in the history of the Bengal Subah*, p. 124, Letter to Court, 18 Jan, 1754.

became a defaulter. Again in scheduled months, the *gomasta* used to reappear to the weavers' villages to collect the cotton piece-goods for which he made advance.

In the new system, the advances were supplied by the Commercial Resident directly to the weavers. The Commercial Resident made the weavers registered. The weavers had to attend the *aurung* once a year to settle their accounts, and make new engagements with specifications as to rate, weight, size and quality of the cotton clothes. The acceptance of orders was formalized by the weavers signing *kistbundi* papers. Like the former system, a company weaver was strictly forbidden to undertake engagement with any other person or concern offering even a higher rate or better terms.¹⁶⁵ The clothes brought to the *aurungs* used to check carefully by the servants of the Company, and if they detected any cloth as below the mark, they would reject it. The damaged clothes were returned to the weavers who were bound by their engagements to provide substitutes.¹⁶⁶ The weavers appealed to the factory to price their damaged clothes at a lower rate. These kinds of requests were not always entertained. So, very often at the end of the year, after having worked on the loom many weavers fell into the debt burden to the Company.¹⁶⁷ Further, continuation of work of these weavers with the Company used to enhance their indebtedness. Those weavers who could not meet their debts to the Company used to abscond from their place of work, either to another *aurung* or into less dependent occupations. Some of them left their traditional occupation and engaged themselves as cultivators or fishermen. Due to this event, an overall decrease in the number of looms and weavers occurred in Dhaka factory in 1786-87.¹⁶⁸

¹⁶⁵ Ghosal, H.R., *Economic Transition in the Bengal Presidency*, p. 8.

¹⁶⁶ Hossain, H., 'The Alienation of Weavers: Impact of the Conflict between the Revenue and Commercial Interests of the East India Company, 1750-1800', *The Indian Economic and Social History Review*, 1979, vol. 16, no. 3, p. 333.

¹⁶⁷ *ibid.*

¹⁶⁸ Quoted in Hossain, H., *op. cit.*, I.O.R., Home Miscellaneous, 795, p. 20.

The weavers were paid advances for two to four pieces at a time and not exceeding forty in a year.¹⁶⁹ The advances were paid in small installments because of the fear that the weavers sometimes spent the money on food and delivered no clothes or ran away to other place.¹⁷⁰ The total advances were divided in four installments, such as, one-fourth in February, one-fourth in April or May, one-fourth in July, and the remainder after the arrival of the first consignment, which corresponded to half the expected goods.¹⁷¹

The *tagaders* (peon) used to keep watch on the movement and work of the weavers. The *tagaders* used to accompany the weavers to the market to observe that the Company's advances were properly disposed of in a due proportion being appropriated to the purchase of thread.¹⁷²

Now, let us consider the income of the *gomasta*, *dalal* and others who were associated in cotton trade. A *gomasta* usually used to earn a monthly salary which varied from Rs 15 to Rs 20. In addition to his salary, he appropriated certain amount of commission on the total investment. An efficient *gomasta* could make a business of, say, Rs. 12,000 to Rs.16,000 in ten months and procure 3,000 to 4,000 pieces of clothes.¹⁷³ Here, one *muharer*, one cashier and 3 to 4 *tagaders* or *paiks* were associated in the business. The *gomastas* used to earn a lot of money from illegal and clandestine business, as also from the exaction from the weavers. The salaries of a *muharer*, a cashier and a peon were Rs 12, Sa Rs 10 and Sa Rs 3, respectively. A

¹⁶⁹ WBSA, *Proceedings of Board of Trade* (Commercial), 3 Feb 1792 and 12 May 1795..

¹⁷⁰ Feldback, Ole, op. cit., p. 127.

¹⁷¹ *ibid*

¹⁷² WBSA, *Proceedings of Board of Trade* (Commercial), 12 May 1795.

¹⁷³ Feldback, Ole, op. cit., p. 130-33.

dalal worked on commission, the rate being $\frac{1}{2}$ *anna* on a rupee or 3.13% on purchase.¹⁷⁴ He also had some underhand income.

The system of investment through the Commercial Resident in the period under review was a very convenient mode of procurement of goods by the English Company where the weavers were bound to supply a stipulated quantity of goods of standard quality and within a given time. By this system, the Company overcomes the uncertainty of ready money purchase and the fluctuation of prices as the rates were fixed long before the actual procurements.

Now, we let us consider the transport facilities of the three districts. The transport was not favorable for the all parts of cotton manufacturing centres of the three districts which created great difficulties in procurement. The district of Hooghly was well connected with Calcutta port by the river Bhagirathi. Hooghly was a great port since seventeenth century. Some other small rivers like Swaraswati, Damodar, etc. were used for transports which were only navigable for a few months in the year. In Burdwan district the two small rivers, the Ajoy and the Damodar were the two river routes of transport which were only navigable for a few months in the year. Katwa and Kalna were well connected with Calcutta port by the river Bhagirathi. In Birbhum district, the Ajoy and the Mor were two rivers which were navigable only for a few months (namely, July to September) in a year. As many weavers' hamlets were situated in the interior of the districts and far away from water courses, the principal means of transport of cotton piece-goods was pack bullocks where *coolie* (porters) and bullock-carts were the subsidiary ones. The caravan passed throughout the year, although it increased in number between October and February. Since the foreign-bond vessels left the Presidency ports mostly between November 10 to March 10,¹⁷⁵ the merchandise had to be dispatched so as to reach the port well ahead of the time of their departures.

¹⁷⁴ *ibid.*

¹⁷⁵ *ibid.*, p. 134.

III

Like the other places of Bengal, the cotton industry in those districts was a domestic rural handicraft industry and carried on with the rudest and cheapest apparatus where neither any huge capital nor any large factory was required.

There were many stages of production. The first stage was freeing the raw cotton from the seeds. The second stage was the bowing the cotton to clear it from dirt and knots. The spinning was the third stage. After spinning, the next stage was weaving, other two stages being washing and dyeing of clothes.

In the stage of spinning, it was spun without any carding by the women. The cotton yarn was spun by thread wheel or by metallic spindle. In a letter to the Board of Revenue, the Collector of Burdwan in 1789 stated that threads were produced both from the spindle and the wheel, the finest kinds being made by the spindle and worse by the wheel in the district of Burdwan.¹⁷⁶

Many households in the village had a spinning wheel. The women of the household used to spin at their leisure hours. These women spinners belonged to all castes, the highest as well as the lowest.¹⁷⁷

In the district of Burdwan, the female members of the families, by whom the cotton plant was cultivated, as well as those who employed labours in the cultivation and spin, used to produce thread what was sufficient for the production of clothes for their own families. There exist scarce instances where they made thread for sale. The residual of the produced cotton by the families, which was not used in the production of thread, was usually sent to market in the form in which it was collected. The whole cotton whether produced in the district or imported, used to be purchased by all

¹⁷⁶ Guha, R and Mitra, A.(Ed.), *West Bengal District Records New Series Burdwan Letters Issued, 1788-1800*, p.20.

¹⁷⁷ Ward, W., *A View of the History, Literature & Mythology of the Hindoos*, vol.I, p.93.

the poorer class, or indent natives of all ranks and descriptions. The women of those families who from their infancy were brought up in an exposure to spinning employed their leisure for sustenance. The women of numerous poor Brahmin families used to begin spinning from their infancy, and their expertise made it possible to earn proportionate profits for their good quality of threads.¹⁷⁸

The thread thus prepared was sold by the spinners in the *Haut* or market and had to pay a *Haut* duty of 2 *couries* on every *tolah* weight of thread for both fine and coarse quality. That was purchased by the weavers. The women of a weaver family seldom spun, as their leisure hours were fully engaged in various assistances which they were able to render to the weaver in the manufactory of his clothes.¹⁷⁹

In Burdwan district, the average earning of a spinner varied from 1 Rupee 6 anna to 1 Rupee 4 anna in a month around. A seer of *kapas* equal in weight to 60 Sa Rs yielded cotton of the weight of 11 Sa Rs 4 annas. In the general manufacture of thread a loss of 2 Sa Rs weight arose in the cleaning. So, the net quantity of cotton fit for thread remained 9 Sa Rs 4 annas weight. Of this quantity, 3 Sa Rs 12 annas was used for the production of finest thread which was produced by the spindle. The residue of the cotton weighing 5 Sa Rs 8 annas was used for the production of coarse thread. The coarse thread was produced by the wheel and was used for the manufacture of clothes which were usually worn by the natives.¹⁸⁰

In the District of Birbhum, a spinner used to spin 7 seers of yarn a month.¹⁸¹ Generally one rupee procured 2 ½ seers of cotton, one could earn 1 rupee 10 annas and 1 rupee 9 annas and 9 gandas per month by spinning the middling and ordinary sorts of

¹⁷⁸ WBSA, *Proceedings of Board of Trade* (Commercial), 10 Jan. 1818 and Guha, R and Mitra, A. (Ed.), *W B. District Record, Burdwan, Letter Issued*, P. 20.

¹⁷⁹ *ibid*

¹⁸⁰ *ibid*

¹⁸¹ WBSA, *Proceedings of Board of Revenue*, 15 June 1789.

thread, respectively.¹⁸² For the spinning of fine thread, greater skill and time were required. In this case, a spinner used to prepare 4 ½ seers of the first class yarn which yielded her 1 rupee 11 annas a month.¹⁸³

The weaving was done in the weavers' loom where very rude and simple apparatus were used. Weavers used to weave under the shade of a tree. Martin describes that the practice of weaving under the shade of a tree was common in Burdwan, like many other places of Bengal.¹⁸⁴ The requirement of capital by a weaver was very small. The cost of making a loom was about two rupees and a half, sticks for warping and wheel for winding worth two annas, a shop costing four rupees and yarn for two ready money pieces about five rupees in value, constituted all the capital.¹⁸⁵

Unlike spinning, weaving was confined to a particular caste of Hindus (*Tanti*) and a particular section of the Muhammadans (*Jola* and *Momin*). But when the demand for clothes expanded, the caste barrier had broken down and many people of higher or lower castes joined in the weaving industry.¹⁸⁶ But, if we consider the Danish Report of Serampore, we see that weaving was confined to the weaver's caste only. The Report described that a weaver could not be a member of other caste or tribe if his father was not a weaver. Thus a son of a weaver was bound to follow his father's trade and would never become anything else than a weaver.¹⁸⁷

The weaving was carried on along with agriculture, and the capital requirement was small. So, it is not impossible that weaving was also spread among the castes other

¹⁸² *ibid*

¹⁸³ *ibid*

¹⁸⁴ *House of Commons* (P.P. 1840, vol. 8), p. 278.

¹⁸⁵ Martin, M., *History, Antiquities, Topography, and Statistics of Eastern India*, vol. 3, pp. 974-75.

¹⁸⁶ Thomas, P.J., 'The Indian Cotton Industry, about 1700 A.D.', *Modern Review*, Feb., 1924, p.45.

¹⁸⁷ Feldback, Ole, *op. cit.*, p.126.

than the weaving caste. A joint petition of some weavers was submitted to the Board of Trade on 20th Feb. 1798, where the weavers were Nittoy Luchun, Joogul Luchun, Ramjeebun Luchun, Rajeeb Ghosh, and Ramnaut Kundu. They were the inhabitants of Mozah Battirish Bigha of Cusbeh Sellimbad in Parganah Havellee under the Burdwan district¹⁸⁸ who belonged to the castes other than *Tanti*. A great number of both of the low caste Hindu and Mahammadan farmers used to have a loom in their house where both men and women used to work during their leisure hours and make ordinary coarse cloth.¹⁸⁹ Actually, the people of different castes like *Pramanik* (barber), *Nath* (*Joggi*), *Telly* (oil grinder), *Kamar* (blacksmith), and also the people of so-called higher caste like *Bramhin*, *Kayestha*, etc. were engaged in weaving industry. Here we can infer that weaving was not confined to a particular caste but we have no sufficient information about the percentage of the other caste people in the weaving industry.

The average earning of a weaver per month in the districts varied from 3 to 4 sicca rupees. A weaver was paid 10 to 12 annas for a piece of cloth which was the fruits of the labour for $5\frac{1}{2}$ to 6 days of a skilled weaver. Some work-days lost due to holidays and festivals. A weaver used to manufacture $4\frac{1}{2}$ to 5 pieces per month at most and used to earn 3 Sa Rs. When time was best, a weaver used to earn 3 and half rupees at most.¹⁹⁰ Here, $\frac{1}{4}$ or $\frac{1}{5}$ of his income generated from the labour of minors and female members of the family.¹⁹¹

According to the estimation of the Danish Head Factor of Serampore, the highest earning of the best weaver of Birbhum was Rs 3 to Rs 4 per month when he was fully

¹⁸⁸ WBSA, *Proceedings of Board of Trade* (Commercial), 20 Feb. 1798.

¹⁸⁹ Martin, op cit, p. 974-75.

¹⁹⁰ Feldback, Ole, op. cit., p. 130.

¹⁹¹ *ibid.*

employed. From the said amount certain percentage was lost for the payment of various exactions and commission to the 'dalal.'¹⁹²

Now we consider the washing of clothes. The Danish report on textile production described that in highly specialized system of production of Bengal cotton industry, there was a separate group who were specialized in washing, and there were certain washer men in all weaving districts.¹⁹³

In Birbhum district the usual rate of a washer man was 1 ½ annas per piece of garha or 2 rupees a corge (20 pieces), that is 10 rupees per hundred. In the lean season, the production of *garhas* was small and the rate of washing reduced to 9 rupees or 8 rupees 12 annas per hundred.¹⁹⁴

Now we consider the dyeing of cloth. The cotton clothes was coloured by the indigenous dyers of the districts. They used indigo, lac, mulberry, etc. for the purpose. A yellow dye resembling madder was used in the district of Burdwan which was extracted from the seed of a shrub called the *Cumla Gooree*. The *Cumla Goorees* were found in the jungles of Bissenpore and in the Talooks of Dulbhoom, Sheekerbhoom, and Balrabhoom where it was cultivated. Its market price was one rupee for 2 seers. Sometimes, an indigenous variety of yellow dye was used which was extracted from the fibres of the root of *auch* trees.

The cost of production of cotton piece goods was calculated from the costs in all stages of production up to when the articles became ready to be dispatched from the districts' production centres to the European settlement. These costs used to make the *aurung* price of cotton piece-goods. It was the sum total of prices of cotton yarn, weaver's wage, *dalal's* commission, washer man's remuneration, employee's salaries, and other incidental charges.

¹⁹² *ibid.*

¹⁹³ *ibid.*

¹⁹⁴ *ibid.*, p.132.

The cotton goods were dispatched from the *aurung* to the Calcutta port and so some other expenses or costs used to add with the *aurung* price. These costs increased due to packing, road or river transport, custom duty, wages of armed guards, and other persons necessary to supervise the goods and sundry costs. Such charges were termed as “charges merchandise” which were calculated at 2 ½ % to 5% on the *aurung* price, depending on the distance from the *aurung* to the ports.

In the district of Birbhum, in ordinary good season, the *aurung* price of 20 pieces of *garhas* was estimated at Sa Rs 67 and 11 annas only.¹⁹⁵

In the district of Hooghly, the price of the piece-goods of Haripal was 117 Sa Rs 3 annas and 10 pies (including of charges merchandise) for 14 pieces and it was sold at 147 Sa Rs and 10 annas after imposition of profit of Sa Rs 30.39.¹⁹⁶

In Mundlegaut of Burdwan district the price of 138 bales of piece-goods was 43,414 Sa Rs 5 annas and 10 pies when it was shipped for England.¹⁹⁷

IV

The production of cotton piece-goods in the three districts required a large amount of raw material. The cotton industry of the districts collected its raw material from the districts' production of cotton, or imported from different parts of India.

Different varieties of cotton were cultivated in all three districts. In the district of Burdwan three sorts of cotton were produced which were *caur* or *nurmah*, *muhree*, and *bhoga*. The *nurmah* cotton was the finest quality and the thread from that cotton was used in the manufacture of *nyansooks*, *mulmuls*, *seerbati* and *dooreas*. The *muhree* was inferior to *nurmah* in quality and the thread from which was used in the

¹⁹⁵ *ibid*, p.132

¹⁹⁶ WBSA, *Proceedings of Board of Trade* (Commercial), 13 Feb. 1798..

¹⁹⁷ WBSA, *Proceedings of Board of Trade* (Commercial), 9 March 1798.

production of the finer *dhoties*, *guzzees*, and *garhas*. The *bhoga* was coarser than *muhree* and yielded threads which were used in the production of coarser *garhas* and other cloths of similar quality.¹⁹⁸ The price of *nurma kapas* which was the cotton as plucked from the plant before it was freed from the seed was on average 6 Rupees per maund. This *kapas* yielded clean cotton about one-fifth of its quantity.¹⁹⁹ The price of a maund of the *muhree kapas* was on average about 5 Rupees which yielded clean cotton something less than one-fourth of its quantity.²⁰⁰ The price of *bogah kapas* varied from 3 Rs to 4 Rs 2 annas and 10 gundas per maund which yielded clean cotton about one-fourth of its quantity.²⁰¹

The *nurma kapas* was cultivated on high spots of land called *dangah* land. The *muhree kapas* was cultivated only in the Pergunnah of Mundulgaut. The *bogah kapas* was cultivated on land denominated the *dow tuffussully* where the *Aus* paddy was cultivated before the cotton. The rent of land where the *nurma* was cultivated varied from 1 - 4 annas to 3 Rs per *bigah*. The rent for land for the *muhree* cultivation was about 2 Rupees per *bihga* and the rent was about 4 to 6 Rs per *bigha* where the *bogah kapas* was cultivated. The net profit in a favourable season, to the cultivator of the *nurma kapas* was Rs 2 to Rs 2 and 8 annas in a year, to the cultivator of the *muhree kapas* was Rs 2 to Rs 2 and 6 annas and to the cultivator of the *bogah kapas* was Rs 3 to Rs 4 to 8 annas.²⁰²

Beside its own production, considerable imports annually took place in the district of Burdwan from Nagpoor, Ammarabatty, Pulpurrah, and Bombay. The price around 1790 was Rs 17 per maund for the Nagpooree cotton, Rs 16 and 12 annas per maund for the cotton of Ammarabatty, Rs 14 to 16 for the cotton of Pulpurrah and Rs 17 and

¹⁹⁸ Ibid.

¹⁹⁹ Guha, R and Mitra, A. (Ed.), *W B. District Record, Burdwan, Letter Issued*, P.19.

²⁰⁰ Ibid.

²⁰¹ Ibid.

²⁰² Ibid.

4 annas per maund for Bombay cotton. The Bombay cotton was of a superior quality and was used for the production of finer piece-goods like *mulmul*, *nainsooks*, *cossahs*, etc. The rest three types of imported cottons were used for the production of coarse cloth like *garhas*, *guzzees*, etc. The gross quantity of import exceeded the actual production of the district at least by 50,000 maunds.²⁰³ We see that 2 lakh maunds of *kapas* were produced in the district, and if we assume the *kapas* yielded cotton one-fourth of its quantity, the district production of clean cotton was about 50,000 maunds. So, we can say that gross import of the district was nearly 1 lakh maunds per year.

In the district of Burdwan, a Report of the District Collector in 1848, shows that the total area of land under the cultivation of cotton in the district was 16,000 *bighas*.²⁰⁴ The yield per *bigha* was 35 lb. and the average price was 3.80 d per lb.²⁰⁵ The total production of the district was 560,000 lb.

In the district of Hooghly, three sorts of cotton were produced which were *caur*, *muhree* and *bhoguee*. The *caur* cotton was used for the production of fine cloth where as the coarser clothes were produced by the other two sorts, the *muhree* and *bhoguee*. The total quantity of cotton production was about 15,000 to 17,000 maunds a year.²⁰⁶ In Haripal of the district, two sorts of cotton were produced which were *bogah* and *corree*. The first sort or *bogah* was inferior in quality and used to produce *guzzees* which were the coarsest clothes worn by the poor people. The Company's assortments were made from the *corree* cotton.²⁰⁷ The time for sowing the *corree* was from the end of September to the 20th October and was gathered from the 12th May to

²⁰³ Ibid.

²⁰⁴ Medicott, *Cotton Hand Book for Bengal*, p. 93.

²⁰⁵ Ibid, p. 95.

²⁰⁶ WBSA, *Proceedings of Board of Trade (Commercial)*, 10 Aug. 1790.

²⁰⁷ Ibid.

the 20th June.²⁰⁸ Here, the cotton was cultivated on high spots of land and give more profit than the profit from the cultivation of other crops.²⁰⁹

In 1848, the Report of the District Collector shows that the total area under the cultivation of cotton in the district of Hooghly was 9,000 *bighas*.²¹⁰ The yield per *bigha* was 55 lb and the average price was 3.15 d per lb.²¹¹ The total production of the district was 495,000 lb.

An inferior quality of Cotton was cultivated in the district of Birbhum which was called by *bhoga*.²¹² Here, the cultivators of cotton were used to derive a profit of 60 per cent.²¹³ The district's production of raw cotton was less than the requirement of its cotton industry. Around 1789, 80,000 maunds of *kapas* of inferior quality were produced in the district. Around 40,000 maunds were produced in Birbhum proper and the rest equal amount was produced in Bishnupur.²¹⁴ This *kapas* yielded clean cotton about one-fourth of its quantity or 20,000 maunds which were used in the manufacture of cotton clothes.²¹⁵ The expense of cleaning was defrayed by the sale of husk, seed, etc.²¹⁶ The Company's *aurangs* alone consumed about 25,000 maunds of cleaned cotton.²¹⁷ So, a large quantity of cotton had to be imported from outside the district. In 1790, about 17,000 maunds of *kapas* or 4,250 maunds of cleaned cotton

²⁰⁸ *Reports and Documents connected with the proceedings of the E.I.C., p. 303.*

²⁰⁹ *ibid.*

²¹⁰ Medlicott, *op cit*, p.160.

²¹¹ *ibid.*

²¹² *Reports and Documents connected with the proceedings of the E.I.C., p. 302.*

²¹³ *ibid.*

²¹⁴ *ibid.* and Medlicott, *op cit*, p. 160.

²¹⁵ *ibid.*

²¹⁶ O' Mally, *op. cit.* , p.18.

²¹⁷ WBSA, *Proceedings of Board of Trade (Commercial)*, 10 Aug. 1790.

were imported by the way of Murshidabad and Patna.²¹⁸ Some amount of cotton was imported from Mirzapur.²¹⁹ Around 1800, the then English Commercial Resident, John Cheap compelled the *ryots* to cultivate cotton.²²⁰

In the district of Birbhum, a Report of the District Collector in 1848, shows that the total area of land under the cultivation of cotton in the district was 1500 *bighas*.²²¹ The yield per *bigha* was 66.6 lb. of clean cotton and the average price was 2 d per lb.²²² The total production of the district was 99,900 lb.

V

Cotton spinning and weaving were the popular occupations of a considerable section of the total population of the three districts. A large number of people were engaged in weaving as a part-time occupation beside their normal engagement in agriculture. The spinning was carried on by the women who used to spin besides their household works. There existed many weavers who used to engage themselves in weaving as whole-time workers. Actually, the part-time weavers used to engage in the production of coarser clothes. But, the fine muslin or fine calicoes were produced by the specialized whole-time weavers only. A *ryot* used to quit his plough to work at the loom or used to leave the latter in order to resume the former, but this was a common practice, especially among those who used to made coarser clothes.²²³

In the district of Hooghly, many people were engaged in cotton industry. In 1810, John Forsyth, Resident at Gollagore factory, stated that there were 1400 weavers at Chandernagar. Two to three hundred among them received advances from the

²¹⁸ *Ibid.*

²¹⁹ *Ibid.*

²²⁰ *Ibid.*

²²¹ Medlicott, *op cit*, p.92.

²²² *Ibid.*

²²³ Taylor, *A Descriptive and Historical account of cotton manufacture in Dacca in Bengal*, p. 73.

Hooghly *aurung*. According to an enquiry of the Resident, the remaining weavers, i.e. about 1000 to 1200 who used to produce the best clothes never received the Company's advances²²⁴. Now, we assume one loom was required to give full-time job to 5 to 6 weavers.²²⁵ Here, there were 1400 weavers and so the number of looms at Chandernagar was 233 to 280. From Gollagore factory, in July 1804, a petition had been sent to the Board of Trade which was signed by 1052 weavers of Gouripur, 700 weavers of Khanpoor, 470 weavers of Gurup, 1400 weavers of Gollagore, and 380 weavers of Majenan. In other words there were 4002 signatories or weavers. Presumably, there existed some weavers who did not sign the petition in those places. So, the total number of weavers was more than 4002.²²⁶ If we assume 4002 weavers in Gollagore factory, the number of looms under the factory was 667 to 800.

In the district of Birbhum, all the *aurungs* were under the Resident, John Cheap of Sonamookhy. During a long period of time, Sonamookhy (Bankura-Bishnupur) had been the head factory of the Sonamookhy Commercial Residency with 31 subordinate *aurungs*.²²⁷ During 1786-87 these *aurungs* were scattered over the districts of Birbhum-Bishnupur, Burdwan, Murshidabad and Rajshahi.²²⁸ Cheap stated that about the year 1789, the number of weavers' houses under the Sonamookhy Residency was about 3000 and the number of weavers was 4000.²²⁹ The number of looms under the Sonamookhy Commercial Residency was 667 to 800.

²²⁴ WBSA, *Proceedings of Board of Trade* (Commercial), 16 Feb. 1810.

²²⁵ Prakash, Om, *The Dutch E.I.C. and the Economy of Bengal*, p. 241.

²²⁶ WBSA, *Proceedings of Board of Trade* (Commercial), 17 Aug. 1804.

²²⁷ O'Malley, *op. cit.*, p.39.

²²⁸ WBSA, *Proceedings of Board of Trade* (Commercial), 10 Aug. 1790.

²²⁹ WBSA, *Proceedings of Board of Trade* (Commercial), 15 Dec. 1789.

In the district of Burdwan, during 1813-14, the total population of the district was 14,44,487. Among them, the total number of people belonging to *Tanti* (weaver) caste was 27,180.²³⁰

VI

In the districts cotton textile production followed agriculture as the most productive sector from the view point of its scale and general significance in the economy. The cotton textile industry had developed in the districts prior to the establishment of the district administration by the English. The entry of the European merchant capital into the districts enhanced the productive potentialities of the districts' rural cotton industry to a great extent. A growing market abroad, particularly in England and other European countries led to a large increase in the production of cotton piece-goods in three districts.

The cotton weavers of the districts produced their commodities at home with implements of their own. That is, a traditional pre-industrial production method was used. The noticeable features of this method were its extensive use of human labour and the extreme simplicity of the mechanical aids. But the quality of products was not due to the sophistication of the tools used, but was exclusively a function of manual dexterity and was far better than the machine-made British product in the period under review.

The cotton industry of the districts gave employment to a large portion of the population in the districts. Though it is not possible to estimate accurately the exact number of people engaged in the industry but it may be inferred with some certainty that production of cotton goods formed the employment of the bulk of the total population in the different stages of production either as a part-time or full-time engagements. Weaving was a whole-time occupation for a considerable section of the

²³⁰ Bayley, W.B., 'Statistical View of the Population of Burdwan', *Asiatic Researches*, vol. 12, 1816, p. 566.

population of the districts, although, to some people, it was a part-time occupation. As a part-time occupation the people used to earn remuneration which enabled them to supplement their income.

The cotton industry in Birbhum, Burdwan and Hooghly districts thus played a very important role in the economic life of those districts.

Chapter - V

Chapter - V

Onset of the Industry's Decline: Identification of the Period

The cotton textile industry of three districts of Bengal, namely Burdwan, Birbhum and Hooghly, grew prior to the advent of the European traders into these districts. The rural cotton industry of those districts used to meet mainly the local needs and that of the neighbouring districts. The fine muslins and calicoes of Burdwan and Hooghly districts had some market in different parts of India and foreign countries as well.

The arrival of European merchant capital into the districts integrated the districts' economy with the world market. The integration enhanced the productive potentialities of the cotton industry of the districts enormously. The growth of market in abroad, particularly in Europe, stimulated the production of the industry to a great extent in those districts.

In the latter half of the eighteenth century, the British East India Company acquired political authority of Bengal. Since then, the cotton industry had become dependent mainly on the investment of the British Company in the region. The vast trading network of the Company around the Globe led to a spectacular hike of demand for cotton piece-goods of Bengal for export and thereby its production. As a result, an unprecedented growth of the districts' industry was seen. But with the enlarged growth rate, the basic structure of the industry and the technology of production remained unchanged.

The districts' industry could not maintain its high growth rate, and started to decline as the English cotton piece-goods successfully captured the world market which used to dominate by the Bengal cotton goods previously. On the basis of available data and

evidences, this chapter seeks to identify the commencing period of the decline of the cotton industry in the aforementioned three districts.

The chapter is divided into five sections. Section I identifies commencement of the period of the decline on the basis of employment statistics. Section II considers the raw cotton related matters to find out the period of the decline. The commencing period of decline will be discovered on the basis of the investment figures of the English Company in different cotton manufacturing centres of the districts in Section III. Section IV takes into account some contemporary evidences which suggests the period of the decline. Section V is concluding part.

I

We can identify the period of the decline of districts' industry on the basis of the size of population engaged in the industry through different periods. In the period under review cotton textile industry was the staple industry in the districts of Burdwan, Birbhum and Hooghly, and it generated employment for a large number of people either as a whole-timer or as a part timer. The employment in the industry increased after the mid-eighteenth century through the investment of the British East India Company. This prosperity gradually disappeared in the first half of the nineteenth century when export of the East India Company decreased considerably. In the first half of the nineteenth century, the machine made cotton products of England captured the World market, as well as the domestic market of India, leading to gradual reduction in the demand for Bengal cotton goods. This section tries to identify the period when the employment generated by the cotton industry in the three districts started to decline. This period of decline indicates the actual period of decline of the districts' industry.

The data about the employment generated by the industry of the districts are very scanty for this period. We shall evaluate the level of employment in the industry on the basis of the amount of investment made by the English Company in different *aurangs* of the districts. These employment figures show the employment of weavers

who were engaged in the production of goods for the English company. There existed some weavers who used to receive no advances from the English Company and used to work for private traders and other foreign companies. It is very difficult to calculate the numbers of those weavers because the employment data regarding those weavers are almost nil during this period. Thus to identify the actual period of the decline of the industry we have to depend up on the employment data of the Company's weavers. After the advent of the Company, the industry had become highly dependent on the investment of the Company, and the numbers of employment generated by the industry per year indicates the condition of the industry.

A few available employment figures for different *aurangs* of the English Company in the districts have been considered here. Haripal was an important *aurung* of the district of Hooghly. In 1807, the total number of weavers in the *aurung* was 5,209.²³¹ In 1810, John Forsyth, Resident at Gollagore factory of Hooghly district, stated that there were 1400 weavers at Chandernagar. Two to three hundred among them received advances from the Hooghly *aurung*. According to an enquiry of the Resident, the remaining weavers, i.e., about 1000 to 1200 used to produce the best clothes never received the Company's advances.²³² From the Gollagore factory in July 1804, a petition had been sent to the Board of Trade which was signed by 1050 weavers of Gouripur, 700 weavers of Khanpur, 470 weavers of Gurup, 1400 weavers of Gollagore and 380 weavers of Majenan. That is, there were 4002 signatories or weavers. Probably, there existed some weavers who did not sign the petition in those places. So, the total number of weavers was more than 4002.²³³ In the district of Birbhum, all the *aurungs* were under the Resident, Mr. John Cheap of Sonamooky. As per a statement of Cheap in 1787, the number of weavers' houses under the Sonamooky Commercial Residency was about 3000, and the number of weavers was

²³¹ WBSA, *Proceedings of Board of Trade* (Commercial), 31 July 1807.

²³² WBSA, *Proceedings of Board of Trade* (Commercial), 16 Feb. 1810.

²³³ WBSA, *Proceedings of Board of Trade* (Commercial), 17 Aug. 1804.

4000.²³⁴ In Burdwan district, during 1813-14, the total population of the district was 14, 44,487, among them, the total number of people belonging to *Tanti* (weaver) caste was 27,180.²³⁵

It is estimated that the numbers of weavers in different periods in aforementioned districts on the basis of the investment of the English Company in different *aurungs* of the districts; first an investment-employment relation was calculated. The relation is as follows, investment of Sicca Rupees 12 gives the employment of two weavers.²³⁶ On the basis of this relation, the employment of weavers in different *aurungs* in the districts was calculated.

In the district of Hooghly, Gollagore was an important *aurung*. Here, in 1776-77, the investment of the English Company was Sa. Rs. 53,879.31.²³⁷ From the above investment-employment relation, the number of weavers employed in the *aurung* in this year was 8,980 (approximately). In 1780-81, the investment of the English Company was Sa. Rs. 1,46,870.69.²³⁸ So, the number of weavers in this year was 24,478 (approximately). In 1787-88, the investment of the English Company was Sa. Rs.2,04,556.03.²³⁹ So, the number of weavers in this year was 34,093(approximately). In 1793, the investment of the English Company was Sa. Rs. 5,29,601.²⁴⁰ So, the number of weavers in this year was 88,267 (approximately). In 1798, the investment of the Company was Sa. Rs. 4,88,953.2. So, the number of weavers was 81,492

²³⁴ WBSA, *Proceedings of Board of Trade* (Commercial), 15 Dec. 1789.

²³⁵ Bayley, W.B., 'Statistical View of the Population of Burdwan', *Asiatic Researches*, vol. 12, 1816, p. 566.

²³⁶ Martin, M., *Eastern India*, P. 974.

²³⁷ WBSA, *Proceedings of Board of Trade* (Commercial), 18 Jan. 1776.

²³⁸ WBSA, *Proceedings of Board of Trade* (Commercial), 20 Feb. 1782.

²³⁹ WBSA, *Proceedings of Board of Trade* (Commercial), 26 Feb. 1790.

²⁴⁰ WBSA, *Proceedings of Board of Trade* (Commercial), 29 Nov. 1792.

(approximately).²⁴¹ In 1810, the investment of the Company in the *aurung* was Sa. Rs. 28,730.2344.²⁴² So, the number of the Company's weavers in this year was 4,788 (approximately). It shows a drastic reduction of the employment of the Company's weavers during 1798 to 1810. In 1817, the investment of the English Company was Sa Rs 3,04,407.²⁴³ So, the number of weavers in this year was 50,735 (approximately). In 1821, the investment of the English Company was Sa. Rs. 35,268.27.²⁴⁴ So, the number of weavers in this year was 5,878 (approximately). In 1824, the investment was only Sa Rs 53,400²⁴⁵ (Santipur included) and only 8,900 (Santipur included) (approximately) weavers were employed. In 1828, the investment was only Sa. Rs. 27,000²⁴⁶ (Santipur & Barnagore included) and only 4,500 (Santipur & Barnagore included) (approximately) weavers were employed. So, the employment of the Company's weavers started to decline considerably since 1824 in the Gollagore *aurung* in the district of Hooghly.

Hurripal was another important *aurung* of the English Company in the district of Hooghly. In the *aurung*, in 1780-81, the investment of the English Company was Sa. Rs. 4,52,394.8.²⁴⁷ So, the number of weavers in this year was 75,399 (approximately). In the *aurung*, the investment of the Company in 1787 - 88 was Sa. Rs. 256250.001²⁴⁸ and the number of weavers employed in the Company was 42,708 (approximately). In 1810, the investment of the Company in the *aurung* was Sa.

²⁴¹ WBSA, *Proceedings of Board of Trade* (Commercial), 13 March 1798.

²⁴² WBSA, *Proceedings of Board of Trade* (Commercial), 11 May 1810.

²⁴³ WBSA, *Proceedings of Board of Trade* (Commercial), 10 May 1817.

²⁴⁴ WBSA, *Proceedings of Board of Trade* (Commercial), 19 Feb. 1822 & 22 Feb. 1822.

²⁴⁵ WBSA, *Proceedings of Board of Trade* (Commercial), 4 Jan. 1825.

²⁴⁶ WBSA, *Proceedings of Board of Trade* (Commercial), 22 Feb., 1828 & 22 Jan. 1828.

²⁴⁷ WBSA, *Proceedings of Board of Trade* (Commercial), 20 Feb. 1782.

²⁴⁸ WBSA, *Proceedings of Board of Trade* (Commercial), 26 Feb. 1790.

Rs.17,135.26.²⁴⁹ The number of the Company's weavers in that year was 2856 (approximately). It shows a drastic reduction in the number of the Company's weavers during 1798 to 1810. In 1817, the investment was Sa. Rs. 1,19,562²⁵⁰ and 19,927 (approximately) weavers were employed. In 1821, the investment was only Sa. Rs. 35,145.6.8²⁵¹ and the employment of weavers were only 5858 (approximately). In 1824, the investment of the English Company was Sa. Rs. 1,276.10.²⁵² So, the number of weavers in this year was 213 (approximately). In 1828, the investment was only Sa. Rs. 695.81²⁵³ and the employment of weavers was only 116 (approximately). So, as like Gollagore *aurung*, the employment of the Company's weavers started to decline in the Haripal *aurung* since 1824 also. From the above analysis, we can conclude that the perpetual decline of the cotton industry in the district of Hooghly started by 1824.

In the district of Burdwan, Katwa was an important *aurung*. Here, in 1776-77, the investment of the English Company was Sa. Rs.21,551.7243. The number of weavers employed in the *aurung* in that year was 3,592 (approximately). In 1798, the investment of the Company was Sa. Rs.220422.4. So, the number of weavers here was 36,737 (approximately). In 1810, the investment of the Company in the *aurung* was Sa. Rs.17,958.2760. So, the number of the Company's weavers in this year was 2993 (approximately). It shows a drastic reduction of the employment of the Company's weavers during 1798 to 1810. In 1819, the investment of the Company was Sa. Rs. 6523.2.²⁵⁴ So, the number of the Company's weavers in this year was 1087 (approximately). So, the employment of the Company's weavers started to

²⁴⁹ WBSA, *Proceedings of Board of Trade* (Commercial), 11 May 1810.

²⁵⁰ WBSA, *Proceedings of Board of Trade* (Commercial), 10 May 1817.

²⁵¹ WBSA, *Proceedings of Board of Trade* (Commercial), 19 Feb., 1822 & 22 Feb. 1822.

²⁵² WBSA, *Proceedings of Board of Trade* (Commercial), 4 Jan. 1825.

²⁵³ WBSA, *Proceedings of Board of Trade* (Commercial), 22 Feb. 1828 & 22 Jan 1828.

²⁵⁴ WBSA, *Proceedings of Board of Trade* (Commercial), 5 Sept. 1819.

decline in the *aurung* after 1819. From the above analysis we can conclude that the perpetual decline of the cotton industry in the district of Burdwan started after 1819.

In the district of Birbhum, all the manufacturing centres of cotton piece-goods were the subordinate *aurungs* under Sonamooky factory of the English East India Company. So, the employment figure of the Sonamooky factory for various years indicates the state of industry in the district. In 1793, the investment of the English Company was Sa. Rs.3,23,454.²⁵⁵ So, the number of weavers in that year was 53,909 (approximately). In 1798, the investment of the Company was Sa. Rs.2,94,244.16.²⁵⁶ So, the number of weavers was 49,041 (approximately). In 1810, the investment of the Company in the *aurung* was Sa. Rs.15443.5625.²⁵⁷ So, the number of the Company's weavers in that year was 2574 (approximately). In 1815, the investment was Sa. Rs. 97,150,²⁵⁸ and the number of employment of weavers was 16,192 (approximately). In 1819, the investment was only Sa. Rs. 11,070²⁵⁹ and the employment of weavers were only 1,845 (approximately). In 1821, the investment of the English Company was Sa. Rs.7,340.²⁶⁰ So, the number of weavers in that year was 1223 (approximately). In 1824, the investment was only Sa. Rs. 185.62²⁶¹ and the employment of weavers were only 31 (approximately). In 1827, the investment was only Sa. Rs. 2.72²⁶² and the employment of weavers was only 0.45 (approximately). It shows a gradual reduction of the employment of the Company's weavers since 1798. The employment of labour reached to only 31 in 1824. From the above analysis, we

²⁵⁵ WBSA, *Proceedings of Board of Trade* (Commercial), 29 Nov. 1792.

²⁵⁶ WBSA, *Proceedings of Board of Trade* (Commercial), 13 March 1798.

²⁵⁷ WBSA, *Proceedings of Board of Trade* (Commercial), 11 May 1810.

²⁵⁸ WBSA, *Proceedings of Board of Trade* (Commercial), 16 Feb 1815.

²⁵⁹ WBSA, *Proceedings of Board of Trade* (Commercial), 12 Feb. 1819.

²⁶⁰ WBSA, *Proceedings of Board of Trade* (Commercial), 19 Feb 1822.

²⁶¹ WBSA, *Proceedings of Board of Trade* (Commercial), 10 Feb 1824.

²⁶² WBSA, *Proceedings of Board of Trade* (Commercial), 12 Jan 1827.

can conclude that the perpetual decline of the cotton industry in the district of Birbhum started by 1824.

Table: 5.1: No. of the weavers in different *aurungs* in the district of Birbhum, Burdwan and Hooghly

Years	No. of the weavers			
	Gollagore	Haripal	Katwa	Sonamooky
1776-77	8980	NA	3592	NA
1780-81	24,478	75,399	NA	NA
1787-88	34,093	42,708	NA	4000
1793	88,267	NA	NA	53,909
1798	81,492	42,070	36,737	49,041
1804	1400	NA	NA	NA
1807	NA	5,209	NA	NA
1810	4,788	2856	2993	2574
1815	NA	NA	NA	16,192
1817	50,735	19,927	NA	NA

1819	NA	NA	1087	1845
1821	5,878	5,858	NA	1223
1824	8,900 (Santipur included)	213	NA	31
1827	NA	NA	NA	Less than one
1828	4,500 (Santipur & Barnagore included)	116	NA	NA

NA: not available.

Source: As mentioned before.

From the table 5.1 we notice that the gradual decrease of the employment started since the early nineteenth century. This steady decline reached to a critical point around 1824 when the employment figures of the *aurungs* of the district reached to three digit numbers which was five digit numbers in 1793 or in 1798. Here we can infer that the districts' industry started to fall considerably around 1824.

II

To identify the period of the decline of the cotton textile industry of aforementioned three districts we shall analyze the data regarding the consumption of raw cotton by the districts' industry, the production of cotton in the districts and the import of cotton into the districts. The decline of the use of raw cotton by the districts' industry which was either produced in the districts or was imported from different parts of India shows the decline of the cotton textile industry of the districts.

One of the significant reasons for the growth of cotton textile industry in different districts of Bengal was the availability of suitable raw cotton in those districts. When the production of cotton piece-goods had increased to a large extent due to its

growing demand from abroad the districts' industry had to depend on the import of raw cotton from different parts of India. According to Colebrook, at one time nearly the whole of the raw cotton required for yarn making in the province of Bengal was produced locally.²⁶³ Later the raw cotton was imported into Bengal from Gujrat through the sea route prior to 1770.²⁶⁴ During 1740 – 85, the raw cotton import from Gujrat was severally affected and gradually decreased. It was completely ceased by 1785. Since then, Bengal started to import raw cotton from the central part of Mirzapur where cotton used to come from Berar and Nagpur. Except Mirzapur, the raw cotton was also imported from Surat, Doab, Bundelkhand and Decan.

Cotton was also produced in three districts. In the district of Burdwan, three types of cotton were produced namely, *nurma*, *muhree* and *bogga*. In 1790, 50,000 maunds of clean cotton were annually produced.²⁶⁵ The annual production of gross quantity of *kapas* (unclean cotton) in the district around 1789-90 was 2 lakh maunds which yield about 50,000 maunds of clean cotton.²⁶⁶ In 1848, a Report of the District Collector shows that the total area of land under the cultivation of cotton in the district was 16,000 *bighas* and the yield per *bigha* was 35 lbs.²⁶⁷ Thus, the total cotton production of the district was 560,000 lbs or 7466.7 maunds.

The following table shows the price of raw cotton in Burdwan district in various years.

²⁶³ Colebrook, *Remarks on the Husbandry and Internal Commerce of Bengal*, p. 84.

²⁶⁴ Guha, A., 'Raw Cotton of Western India: 1750-1850', *Indian Economic and Social History Review*, 1972, vol. 9, p.2.

²⁶⁵ Medicott, *Cotton Hand-Book for Bengal*, p. 93.

²⁶⁶ *Report and Document connected with the proc. of the E.I.C.* p. 300.

²⁶⁷ Medicott, *op. cit.*, p.93

Table: 5.2: Price of cotton in Burdwan district in various years

Years	Prices(annual average) Pence per pound
1789	6.92
1836	4.00
1848	3.36
1854	3.41
1855	3.69
1856	3.20
1857	3.20

Source: Medlicott, p.159: In 1789, price was calculated from *Proc. B.O.R.*, 15 June 1789.

The production of cotton of Burdwan district had decreased from 50,000 maunds in 1789-90 to 7466.7 maunds in 1848. The above table 2 shows that the average price of cotton was 6.92 d/lb which became 4.00 d/lb in 1836. After 1836 price was almost stable. During 1789-90 to 1848 the cotton production of the district had decreased but price did not increase rather decreased. These decrease in both the price of cotton and the production of cotton shows that the decline of the cotton consumption of the district's industry or the decline of the district industry. From the amount of consumption of raw cotton, we can infer that the cotton textile industry of the Burdwan district started to decline in between 1789 to 1836.

As other districts of Bengal cotton was produced in the district of Birbhum as well. An inferior quality of cotton was produced in the district which was called as *bhoga*. The total production of *kapas* of the district was 80,000 maunds around 1789.²⁶⁸ Around 40,000 maunds were produced in Birbhum proper and the rest 40,000 maunds were produced in Bishnupur.²⁶⁹ From this *kapas*, about one-fourth of its quantity or 20,000 maunds of cleaned cotton were produced.²⁷⁰ In 1848, a report of the District Collector shows that the total area of land under the cotton cultivation was 1500 *bighas*.²⁷¹ The yield per *bigha* was 66.6 lb of clean cotton,²⁷² amounting to the total cotton production of the district to 99,000 lb or 1332 maunds. The cotton production decreased from 20,000 in 1789 to only 1,332 maunds in 1848.

Price of clean cotton in the district market was 5.75 d/lb around 1789.²⁷³ In 1836 the price of clean cotton was reduced to 3.64 d/lb and in 1848, the price of clean cotton in the district market became as lower as 3 d/lb.²⁷⁴ It shows that the price of cotton had decreased with the decrease in total production of cotton. This trend clearly shows that the districts demand for cotton had decreased which indicates that the district's industry started gradually declining during the period between 1789 and 1848. Since 1836, price of cotton did not increase. Thus, we can infer that the cotton textile industry of the Birbhum district started to decline in between 1789 to 1836.

²⁶⁸ *Report and Document*, op. cit., p.300.

²⁶⁹ *ibid.*

²⁷⁰ *ibid.*

²⁷¹ *Medlicott*, op.cit., p.92

²⁷² *ibid.*

²⁷³ *WBSA, Proceedings of Board of Trade (Commercial)*, 15 June 1798.

²⁷⁴ *Medlicott*, op. cit., p. 169.

Cotton was also cultivated in the district of Hooghly. Three types of cotton were chiefly cultivated in the district commonly known as *caur*, *muhree* and *bhoga*. The total quantity of cotton production of the district was 15,000 to 17,000 maunds in a year around 1790.²⁷⁵ In 1848, as per a report of the District Collector the total area under the cotton cultivation in the district was 9,000 *bighas*. The yield per *bigha* was 55 lb and the total production of the district was 495,000 lb or 6600 maunds. During 1790 to 1848, the district production had considerably decreased.

The price of the cotton in the district of Hooghly around 1789 was 6.27 d/lb. It got reduced to 3.34 d/lb in 1836 and further decreased to 3.15 d/lb in 1848.²⁷⁶ It shows that the total production of cotton and its price had decreased during 1789 to 1848. Since 1836, the price of cotton did not change. Thus, we can infer that the cotton textile industry of the Hooghly district started to decline in between 1789 to 1836.

The above analysis reveals that the cotton industry of the districts started to decline significantly in between 1789 and 1836.

Beside the drastic fall in the cotton production, the export of cotton from the Bengal presidency to foreign countries started increasing since early nineteenth century which also considerably reduced the supply of cotton for the cotton industry of Bengal. The cotton export from Calcutta to China was started in 1803. The quantity of export gradually increased. It was 26,666.66 maunds in 1803, 2,40,000 maunds in 1806 and 2,93,333.33 maunds in 1814.²⁷⁷

Around 1835, the price of best Buundlecund cotton in Calcutta was C.Rs 16.²⁷⁸ Ten years later, around 1845-46, such cotton was sold at C.Rs 7.08 to C.Rs 10.²⁷⁹ In that

²⁷⁵ WBSA, *Proceedings of Board of Trade* (Commercial), 10 Aug. 1790.

²⁷⁶ Medicott, *op. cit.*, p. 160.

²⁷⁷ Royle, J. Forbes, *On the Culture and Commerce of Cotton in India and Elsewhere*, p.41.

²⁷⁸ *ibid*

²⁷⁹ *ibid*

time, China stopped importing Indian cotton. Thus the price of cotton decreased with no sufficient increase in demand in the home market of Bengal. This shows that a huge decline of demand for cotton in the manufacturing industry of Bengal as well as our districts' industry. This observation directs us to infer that the districts' cotton industry started to decline considerably in between 1789 to 1835.

Mirzapur, the prosperous cotton mart of India started declining since 1820 due to lack of demand from the Bengal handloom cotton industry.²⁸⁰ This decline occurred due to the fall of sale of raw cotton which was the result of a persistent crisis in the cotton handloom industry of Bengal.²⁸¹

From the analysis of above facts, we derive the following inferences. The cotton industry of the districts started to decline considerably between 1789 to 1835, and the collapse of the Mirzapur cotton mart took place due to lack of demands of raw cotton from Bengal. From these observations we can conclude that the industry of the three districts started to decline considerably since 1820.

III

In this section we shall identify the period of the cotton industry's decline of three districts, on the basis of investment of the English East India Company. The cotton industry of the districts had become dependent mostly on the investment of the English Company during the period under review. When the investment gradually started to decline, the districts' industry also started to decline.

The English Company used to pay advance money to procure cotton piece-goods from different *aurungs* of the districts. That system of advances was known as 'investment'. These investments were sent to each *aurung*, usually in the beginning of

²⁸⁰ Guha, A., 'Raw Cotton of Western India: 1750-1850', *Indian Economic and Social History Review*, 1972, vol.9, p. 8.

²⁸¹ *ibid*

a year. These investments give insights into the state of production of the districts' *aurung*.

In the district of Hooghly, Gollagore and Haripal, were the two important *aurungs* of the English Company. The following table 5.3 shows the investment of the Company in various years in the above two *aurungs*.

Table: 5.3: Investment of the English East India Company in various years in Gollagore and Haripal *aurungs* in the district of Hooghly

Year	Gollagore Investment Sicca Rupees	Haripal Investment Sicca Rupees
1776-77	53,879.31	N A
1780-81	1,46,870.69	4,52,394.83
1787-88	2,04,556.036	2,56,250.001
1793	5,29,601	4,70,631(Katwa included)
1798	4,88,953.2	2,52,419.2
1810	28,730.23	17,135.25
1816	2,452.44	1,324.13
1817	3,04,407	1,19,562
1821	35,268.27	35,145.416
1824	53,400 (Santipur included)	1,276.10
1828	27,000 (Santipur & Barnagore included)	695.8

N A: not available

Source: WBSA, *Proc. B.O.T. Comm.* 18 Jan, 1776. *Proc. B.O.T. Comm.* 20 Feb, 1782 *Proc. B.O.T. Comm.* 26 Feb, 1790. 1793, from N. K. Sinha, p. 178. 1798, *Proc. B.O.T. Comm.* 13 Mar, 1798. 1810, *Proc. B.O.T. Comm.* 11 May, 1810. 1816, *Proc. B.O.T. Comm.* 5 Sept. 1817. 1817, *Proc. B.O.T. Comm.* 10 May, 1817. 1821, *Proc. B.O.T. Comm.* 19 Feb, 1822 & 22 Feb, 1822. 1824, *Proc. B.O.T. Comm.* 26 Feb, 1790. *Proc. B.O.T. Comm.* 4 Jan, 1825. 1828, *Proc. B.O.T. Comm.* 22 Feb, 1828 & 22 Jan, 1828.

Above table clearly shows that the investment of the English Company in the Gollagore *aurung* gradually increased from 1776 to 1793. Here the increase was 882.94%. This high investment trend continued till 1798. But from 1798 to 1810, the investment decreased to a large extent. Here the fall was 94.12%. Again from 1810 to 1816 the investment farther reduced and reached to only Sa. Rs. 2,452.44. During 1798 to 1816 the fall of investment was 99.49 per cent. The table shows the same trend of investment in the Haripal *aurungs* well. In 1816 the investment reached to very low level which was only Sa. Rs. 1,324.13. Here the fall of investment from 1798 to 1810 was 93.21% and from 1798 to 1816 was 99.47 per cent. After 1821 the investment started to fall steadily and reached in acute crisis by 1824.

In Birbhum district, all the cotton piece-goods manufacturing centres were under the Sonamooky Commercial Residency of the English Company. Thus, the investment of the Sonamooky factory indicates the state of the industry in the district. The following table 5.4 shows the investment of the Company in various years from 1793 to 1827 in the above factory.

Table: 5.4: Investment in various years from 1793 to 1827 in Sonamooky Commercial Residency of the English East India Company

Year	Sonamooky Investment Sicca Rupees
1793	3,23,454
1798	2,94,244.16
1810	15,443.56
1815	97,150

1819	11,070
1821	7,340.10
1824	185.62
1827	2.72

Source: WBSA, 1793: *Proc. B.O.T Comm.*, Nov. 29, 1792. 1798: *Proc. B.O.T Comm.*, Mar. 13, 1798, 1810: *Proc. B.O.T Comm.*, May 11, 1810, 1815: Feb. 16, 1815 1819: *Proc. B.O.T Comm.*, Feb 12, 1819. 1821: *Proc. B.O.T Comm.*, 19 Feb., 1822. 1824: *Proc. B.O.T Comm.*, 10 Feb., 1824. 1827: *Proc. B.O.T Comm.*, 12 Jan, 1827

Above table 5.4 clearly indicates that from 1798 to 1810, the investment decreased to a large extent. Here the fall was 94.75%. Again from 1810 to 1821 the investment gradually reduced and it reached to only Sa. Rs. 7,340.10 in 1821. In 1824 the investment became only Sa. Rs. 185.9.11. Since then, it gradually reduced farther and became only Sa. Rs. 2.72 in 1827.

All *aurungs* of the Birbhum district and some *aurungs* of the Burdwan district were under the Sonamooky Commercial Residency. So, the investment of the Sonamooky factory also indicates the state of the industry in Birbhum district and partially in Burdwan district. Here the decline of the industry in two districts started considerably around 1824.

In the district of Burdwan, Katwa was an important *aurung* of the English Company. The following table shows the investment of the Company in various years in the above *aurung*.

Table: 5.5: Investment of the English East India Company in various years at Katwa *aurung* in the district of Burdwan

Year	Katwa Sicca Rupees
1776-77	21,551.72
1793	4,70,631(Hurripaul included)
1798	2,20,422.4
1810	17,958.27
1819	6523.2

Source: WBSA, 1776-77: *Proc. B.O.T. Comm.* 18 Jan, 1776, 1793: *Proc. B.O.T. Comm.*, Nov. 29, 1792. 1798: *Proc. B.O.T. Comm.*, Mar. 13, 1798, 1810: *Proc. B.O.T. Comm.*, May 11, 1810, 1819: *Proc. B.O.T. Comm.*, Sept.5, 1819.

Table 5.5 exhibits that the investment of the English Company in the Katwa *aurung* gradually increased from 1776-77 to 1798. Here the increase was 922.79%. But from 1798 to 1810, the investment decreased to a large extent. Here the fall was 91.85%. In 1819, investment decreased further and became Sa. Rs.6523.2.

The fall of investment in three districts in the first decade of nineteenth century can be explained by the Napoleonic war. From 1806, Napoleon largely restricted the continental markets of Bengal piece-goods. As a result, the English Company's export of Bengal piece-goods had been reduced to a considerable extent and the Company was forced to reduce their investment in the districts. After the conclusion of the European war, the investment of the English Company in the districts did not increase much, and was far lower than the investment in the second half of the

eighteenth century. In 1815-1816, the investment in the districts' *aurungs* was remarkably low. Here, the investment did not increase after the war because of the low export demand of Bengal cotton piece-goods in the world market. Around 1813-14, British calicoes started flooding the world market which, for a long time was dominated by Bengal cotton piece-goods. So, the districts' industry was in a crisis and started declining considerably.

Since 1813-1814, the British Industrial Revolution made it possible to produce good quality cotton piece-goods by the factories in England at a very low cost which successfully outclassed and supplanted the Bengal cotton piece-goods from the world market. The value of cotton piece-goods exported from Bengal to London by the English Company was Sa.Rs. 61,67,851 in 1792-93. This export gradually decreased after then. It decreased to Sa. Rs. 34,41,141 in 1813-14, to Sa. Rs. 5,43,376 in 1821-22 and to Sa. Rs 3,42,843 in 1823-24.²⁸² From 1792-93 to 1823-24 the fall of export was 94.44 %. So, the year 1823-24 was the clear turning point of the districts' industry as well as the cotton industry of Bengal.

IV

To identify the actual period of the decline of the industry in the three districts, some contemporary evidences will be considered in this section. These are as follows.

Since the early nineteenth century, the *aurungs* of the districts suffered from the lack of investment by the English East India Company which created problems in the production of cotton goods. Henry William, Resident of the Gollagore *aurung* of Hooghly district, the complained in 1806 that for last four years the Company's advances were not made regularly, and the investment in cloth production was made

²⁸² WBSA, *Proceedings of Board of Trade* (Commercial), 29 June 1827.

by the old outstanding balances.²⁸³ This shows problem of growth of the district industry.

A petition of some weavers of Khattorah and Chaundolia under the Hurripaul *aurung* of Hooghly district shows a complaint against the cessation of the order for coloured cloth by the English Company. According to the petition, the order for the coloured clothes by the company had been stopped since 1824. Before then, since the establishment of the *aurung*, four or five hundred weavers' families of the *aurung* eked out their livelihood by making these coloured clothes for the Company for several successive generations. These weavers reported that they did not receive any advance money from the Company from the year 1824, and after the cessation of the Company's advances, they were very much distressed and had to support their families with difficulties by weaving clothes known as *Banee* and laboring in various other ways.²⁸⁴ This indicates a great plight in the district industry.

Robert Brooke, Resident of the Haripal Factory of Hooghly district, stated in 1824, that in the district, six hundred weavers received advances from the Native Merchants for making of *Seersuckers* (a kind of cloth) to earn their livelihood since the discontinuation of the English Company's advances. When the weavers got the Company's advances, the Danes, French, Dutch and Portuguese also paid the weavers advances, but around 1824, all those channels were closed down. As a consequence, nine hundred other weavers borrowed money from the Native Merchants and made losses at the rate Rs 12 to Rs 13 per piece. Consequently in a distressed state, a few weavers borrowed money from the Native Merchants and employed people to plough the ground for them as it was against their custom to hold the plough.²⁸⁵ This indicates a clear recession of the district industry.

²⁸³ WBSA, *Proceedings of Board of Trade* (Commercial), 25 July 1806.

²⁸⁴ WBSA, *Proceedings of Board of Trade* (Commercial), 27 March 1827.

²⁸⁵ WBSA, *Proceedings of Board of Trade* (Commercial), 29 June 1827.

From the above analysis we see the distressed condition of the weavers in 1824 which clearly infers that the cotton industry of the Hooghly district started to decline considerably after 1824.

In the district of Birbhum, since the beginning of the eighteenth century, the investment in the district cotton industry by the English Company had been suffering much due to the shortage of money. At that time, John Cheap, the then Resident of the Soonamoky factory, stated that he had been facing shortage of silver currency which was the then only medium for payment of advances to the weavers.²⁸⁶ The situation gradually became adverse as the investment of the English Company did not increase later, and the weavers gradually lost their traditional occupation. Cheap stated in 1824, among the weavers who were thrown out from their profession, only a few weavers were able to stick to their jobs, while others became *Sunnassies*, *Byraggies*, *collies*, and agriculturists, but none of them became mechanics. Only a few women and children were able to engage themselves in filature while others might have died after the collapse of the industry.²⁸⁷

From the analysis of the above facts and evidences, the distressed condition of the weavers in 1824 is apparent which clearly testifies to the fact that the Soonamoky factory started to decline considerably after 1824. As all *aurungs* of Birbhum district and many *aurungs* of Burdwan district were under the Soonamoky Residency, it is inferred that the cotton industry of both the districts started to decline considerably after 1820, and that the evidences exhibit its depressed condition since 1824.

²⁸⁶ Feldback, Ole, 'Cloth Production and Trade in Late Eighteenth Century Bengal' *Bengal Past and Present*, vol. 86, 1967, p. 131.

²⁸⁷ WBSA, *Proceedings of Board of Trade* (Commercial), 29 June 1827.

The cotton textile industry of Burdwan, Birbhum and Hooghly districts grew remarkably through the investment of the British East India Company during the second half of the eighteenth century but the growth momentum did not persist for long. From the beginning of the nineteenth century the gloomy phase of the industry began.

The first, second and third section reveal that after 1798, the investment of the English Company gradually decreased, and thereby employment of the industry also decreased. Since the beginning of the nineteenth century, raw cotton export from Bengal to abroad started and increased rapidly, but it did not create any upward pressure on the price of cotton in the districts' market which exhibits reduction of raw cotton consumption by the districts' industry. That reduction shows the decline of the districts' production of cotton goods.

The fall of the English Company's investment after 1798 and in early nineteenth century caused great distress to the districts' industry. The Napoleonic Wars and 'continental blockade' were the causes behind the distress. Napoleon strongly prohibited the entry of the goods produced in England and its colonies into the European Continent.²⁸⁸ In those times, a large amount of Bengal piece-goods were dumped in the Warehouses of the English Company in England.²⁸⁹ As a result, the Company stopped the import of Bengal piece-goods. Since then the Bengal cotton manufactures lost its vast English as well as European market and the British Company reduced its investment to a large extent in the cotton industry of the districts. The war ceased completely by 1813-14.

²⁸⁸ Ray, I., Identifying the woes of the cotton textile industry in Bengal, *The Economic History Review*, Nov. 2009, vol. 62, issue 4, p. 11.

²⁸⁹ WBSA, *Proceedings of Board of Trade (Commercial)*, 17 March 1809.

After the conclusion of the European War, the investment of the English Company did not revive in the districts, and around 1824 the districts' cotton industry was in veritable crisis. After 1813-1814, English machine made calicoes started flooding the world market which at one time was dominated by the Bengal calicoes. The loss of the export market by the Bengal calicoes forced the districts' industry to shut down.

The above analysis shows that 1824 was the clear turning point of the districts' industry from its prosperity to adversity, and some contemporary evidences in Section IV confirmed the proposition.

Around 1824, the spread of English machine made cotton goods in the world market coupled with other forces, nearly ruined the hitherto most extensive and prospering cotton industry of the districts.

Chapter- VI

Chapter- VI

Onset of the industry's decline: Identification of Its Reasons

Bengal was as great a manufacturing province of India as an agricultural one in the pre-colonial period. She was pre-eminently noted for her many rural handicraft industries. Among them, the cotton industry was the most important one. The cotton industry of Bengal was spread in every district of Bengal. In the districts of Burdwan, Birbhum and Hooghly, the industry flourished to a great extent. The districts were considered the important industrial hub for the production of cotton goods. The advent of European capital into the districts enhanced their productive potentialities in rural cotton industry to a great extent. A growing market in abroad, particularly in England and other European countries led to a large increase in the production of cotton piece-goods in the districts. But the traditional industry of the districts slipped away from its prosperity and began to decline at the turn of the eighteenth century. The decline proceeded rapidly in the early nineteenth century and by 1824 the industry totally collapsed.

Many economic historians addressed the issue of the decline of the Bengal cotton textile industry in the nineteenth century and pointed out the reasons behind the decline. As per the existing literatures, the reasons were - the industrial revolution or technological innovation in England, hostile British policy i.e. stringent tariff on Bengal goods in England, the oppressive measures on the Bengal weavers by the British and the loss of market after the fall of royal courts.

With this background, this chapter seeks to show the validity of the above mentioned factors claimed to be responsible for the decline of the districts' cotton industry and identify the actual reason(s) behind the decay.

The chapter is divided into four sections. Section I examines the reasons for the disappearance of court culture to assess its responsibility behind the fall of the districts' industry. Section II analyses the reason of the hostile British policy to evaluate its responsibility behind the decay of the districts' industry. Section III shows the effects of the British industrial revolution in the decline of the districts' industry. Section IV is the concluding part.

I

The disappearance of the court of the Mughal Emperor and their provincial rulers indicated that the costliest superfine muslins which were in demand by the nobles for State occasions or other ceremonial occasions were no longer needed. When the royal courts were abolished, the demand for those costly muslins dried up. After the abolition of the court, the class of nobles existed and their mode of living did not change suddenly and their demand for those muslins continued and to some extent it counterbalanced the loss of demand. But it did not last for long. After the abolition of royal court, the production of costliest muslins for royal use gradually declined.

In the first half of the eighteenth century, the costliest Bengal muslins had ample demand from the Mughal Emperors of Delhi and from their provincial rulers. Since the early seventeenth century, the European traders exported a considerable quantity of Bengal muslins. But those exported muslins were not as costly as the muslins used by the Royal class of India. The price of a piece of Dhakai *Jamdani*, a kind of muslin, was Rs 250 in Sirajuddaullah's time during 1756-57.²⁹⁰ The price of those *Jamdanie*s was Rs 450 per piece which was made for Muhammed Reza Khan, the *Naib Nazim* of Dhaka in the 1760s.²⁹¹ But the price of *Jamdanie*s per piece which was exported by the Dutch and the English varied between Rs 31 to Rs 43.²⁹²

²⁹⁰ Chaudhuri, S., *From Prosperity to Decline Eighteenth Century Bengal*, p.144.

²⁹¹ *Ibid.*

²⁹² *Ibid.*

During the Mughal period, many *karkhanas* (factories) were established for the production of costly muslins for the Emperors, for their provincial rulers and for their royal court. Those *karkhanas* were called by 'mulboos khas cooties'. The muslins produced in those *karkhanas* were called 'mulboos khas' i.e. royal clothing. Those were the finest plain muslin. The 'mulboos khas cooties' were established under the direct supervision of the Mughal government in different parts of the district of Dhaka viz. in Sonargaon, in Junglebarry and in Dhaka. Those *karkhanas* were running with high speed till the first half of the eighteenth century. At the decline of Mughal power and the power of their provincial rulers and expansion of British rule all over India, the weavers gradually pulled down the shutter of those *karkhanas*. Although, some *karkhanas* still existed even in 1800, their production became insignificant.

The royal workshops of the Mughal period gradually declined after 1757 when the British took administrative and political control over the economy of Bengal. Though, the European traders exported Bengal muslins, their export articles were not as good as the royal muslins in respect of both price and quality. The 'mulboos khas' muslins gradually lost its market when the European commerce grew in India. Thus the cotton industry for the production of high quality muslin was ruined and thereby the high skilled weavers gradually lost their profession as a result of the British colonial policy.

The royal muslins were produced only in Dhaka, Sonargaon and Junglebarry of the Dhaka district. In the colonial period, the total extinction of those muslin productions occurred on account of the shrinkage of demand due to the abolition of indigenous royal courts. The British rule caused the permanent injury to the cotton industry which was producing royal muslins. There is no reason to assume that the cotton industry of Bengal as a whole sustained permanent injury on account of shortage of demand for Dhaka muslins in the royal courts. In the districts of Burdwan, Birbhum and Hooghly, calicoes and some plain muslin were produced and royal *karkhanas* were not in existence. The abolition of royal power and thereby the royal court did

not have any impact on the aforementioned districts' industry. Rather, after the advent of European traders, particularly the English East India Company in Bengal gave enough impetus to the growth of the districts' industry temporarily. Thus the above cause cannot be held responsible for the decline of the districts' industry in early nineteenth century.

Hence, we can safely conclude that the disappearance of the noble court in no extent affected the growth of the cotton industry in Burdwan, Birbhum and Hooghly districts of Bengal.

II

The British East India Company started to trade in Bengal around 1615 and the cotton manufactures of Bengal were most important items of their trade. The Company used to export calicoes and muslins of Bengal to England and other parts of Europe. In the second half of the seventeenth century, the Bengal muslins and calicoes had flooded over the English and other European markets. It created potential threat to the textile producers of England who gradually lost their home market and claimed protection from foreign competition. John Pollexfen described that the industrialists of England gradually demanded Parliamentary intervention during the second half of the seventeenth century to mid eighteenth century, to protect the textile industry of their country when the importation of East Indian cotton and silk goods was declared to ruin the poor British manufactures.²⁹³ Subsequently, the British parliament gradually imposed tariff barriers on the import of Bengal goods to England for protecting their infant cotton industry from the competition of the Bengal cotton manufactures. On the other hand, the British in Bengal used many coercive or oppressive treatments on the weavers. The coercive measures discouraged production and the stringent tariffs on Bengal goods in England resulted in closure of many export outlets. These hostile policies depressed the growth of the cotton industry in the districts of Burdwan, Birbhum and Hooghly and the industry of Bengal as a whole.

²⁹³ Quoted in Marx, *New-York Daily Tribune*, July 11, 1853, P. 6.

In the post Plassey period, the British Company gradually captured the Bengal economy and became the main purchaser of the cotton manufactures of the districts. The Company established many *aurungs* in different cotton manufacturing centres of the districts. The employees of the *aurungs* like *gomostas*, *paikars* and *dalals* used to exploit the weavers in many ways. The *gomostas* were entrusted with power by the Company and very often they abused it to fulfill their self interest and exploited the weavers.²⁹⁴ The *gomostas* and other inferior servants of the Company used to take perquisites from the weavers which were quite illegal.²⁹⁵ The various methods of oppressing the poor weavers were fines, imprisonments, floggings and forcing bond from them. As a result, the number of weavers in Bengal decreased considerably.²⁹⁶ The servants of the Company used to give many orders to the weavers and if the weavers failed to follow those orders they had to suffer from corporal punishment.²⁹⁷

After production, goods were sent to Export Warehouse, where the *jassenders* or assorters used to determine the price of the goods supplied by the weavers. The price used to be lower by 15-40 per cent than the market price. It was an exploitation of weavers. The Warehouse used to impose penalty on the weavers if their supplied cloth showed any deficiency in quality. A coarse *garha* used to be 75feet X 2.25 feet and a fine one used to be 72feet X 2.25 feet and their prices were Rs 7 to 8 and Rs 9 to 11 respectively in 1792.²⁹⁸ For those *garhas* the penalty for deficient cloths was Re 1 each.²⁹⁹ Sometimes, the Warehouse rejected the deficient cloths and weavers had to sell the cloths to open market. Very often the weavers would not be able to sell the cloths and it was a dead loss to the weavers. Such losses instigated many weavers to

²⁹⁴ Verelst, H., *A View of the Rise, Progress and Present State of the English Govt. in Bengal*, p.85.

²⁹⁵ WBSA, *Proceedings of Board of Trade* (Commercial), 31 March 1815.

²⁹⁶ Bolt, W., *Considerations on Indian Affair*, P. 74.

²⁹⁷ WBSA, *Proceedings of Board of Trade* (Commercial), 8 May 1818.

²⁹⁸ WBSA, *Proceedings of Board of Trade* (Commercial), 7 Feb. 1792.

²⁹⁹ WBSA, *Proceedings of Board of Trade* (Commercial), 5 Aug. 1794.

give up their ancestral profession and they started motivating their family members to engage in agriculture to overcome the risks of suffering what they themselves had felt.³⁰⁰

In 1795, a group of weavers in Birbhum district directly refused to produce the *garhas* for the English Company. John Cheap, the then Commercial resident of Sonamooky factory prosecuted a number of unwilling weavers to set example for threatening others, but in vain. Cheap ordered the weavers to be present at the factory but the weavers disobeyed the order and challenged the Commercial Resident to prosecute them if he so liked.³⁰¹

The coercion on the weavers of the districts displaced many of them from their traditional profession and the prosperous cotton industry of the districts gradually declined.

Along with the coercion on the weavers, the British Parliament imposed high tariff on Indian cotton goods in England.

Since the last quarter of the seventeenth century, the textile industry (mainly the woolen and silk) of United Kingdom had lost their home market gradually due to large influx of Bengal cotton manufactures. Here the observation of O'Brien, Griffiths and Hunt is worth producing: "England's native woolen and silk interests first become politically active against Asian textiles as early as the 1670s, but agitation to prohibit the consumption of imported calicoes and wrought silks only became serious in the mid 1690s."³⁰² To protect the infant industry from the competition of Bengal cotton products, the British Parliament gradually enacted various acts to prohibit the Indian cotton products. It started from 1700 and the Act

³⁰⁰ Ibid.

³⁰¹ WBSA, *Proceedings of Board of Trade* (Commercial), 1 Sept. 1795.

³⁰² O'Brien, Griffiths and Hunt, 'Political components of the industrial revolution: Parliament and the English cotton textile industry, 1660-1774', *Economic History Review*, 2nd series, vol. XLIV, 3, 1991, p. 401.

prohibited the use of painted, dyed or printed calicoes of India in England.³⁰³ All Indian cotton products used to import to England after the Act only for re export to other European countries.³⁰⁴ An import duty of 15% ad valorem was imposed on Indian white calicoes and muslin.³⁰⁵ After the Act, the import of white calicoes to England increased to a large extent which was printed in England. So, another prohibitive Act was passed in 1720, according to which the use of printed Indian calicoes whether printed in England or elsewhere was prohibited in England. In spite of all such Acts, the export of cotton manufactures from Bengal and from India as a whole was little affected. So, before the period under review, the cotton industry of Bengal was performing reasonably well.

Since 1765, the Indian cotton piece goods imported to Great Britain had to pay an ad valorem duty of 45%, which exceeded by more than 100% than the duty on the raw materials imported from India.³⁰⁶ Yet an additional duty of five per cent was imposed in 1779 on manufactures imported into England and a further five per cent was added in 1782.³⁰⁷ In 1783, to stop smuggling due to high tariff, the British Parliament replaced all previous duties upon muslin, unrated muslin and calicoes and imposed a single import duty of eighteen per cent ad valorem and ten per cent on re-export.³⁰⁸

Since the early nineteenth century, the rates of duty on Indian muslins and calicoes gradually increased. In 1802, the British Parliament imposed around twenty seven per cent and around thirty per cent ad valorem duty respectively on the muslins and white calicoes of Bengal.³⁰⁹ The duties gradually increased and reached maximum in 1813.

³⁰³ Quoted in Ray, Identifying the woes of the cotton textile industry in Bengal, *EHR*, Nov. 2009, p.6.

³⁰⁴ *ibid.*

³⁰⁵ Sinha, J.C., *Economic Annals of Bengal*, p. 26.

³⁰⁶ Hamilton, *Trade Relations between England and India*, pp. 107-8.

³⁰⁷ *ibid.*

³⁰⁸ *ibid.*, p.162.

³⁰⁹ Baines, E., *History of Cotton Manufacture in Great Britain*, p. 76.

In 1813, the ad valorem duty on white calicoes reached around eighty five per cent which was around forty four per cent on muslins.³¹⁰ In 1814, the duties were reduced to sixty seven per cent on white calicoes and thirty seven per cent on muslins.³¹¹ Until 1825, the duty remained more than sixty per cent on the white calicoes and more than thirty per cent on the muslins.³¹² In 1826, the duty was drastically reduced to ten per cent ad valorem on calicoes and on muslins³¹³ and since 1826, the tariff rates were reduced. By 1826, the English cotton goods were able to successfully outclass the Indian cotton goods in the World market as well as in their home market.

Some Hindus of Calcutta complained against the encouragement given to the export from England to India for the growth of English cotton industry, while many thousands of the natives of India, who used to derive their livelihood by the manufacture of cotton goods, were without bread, as a consequence of the facilities provided to the manufacturing industry of England.³¹⁴ The export of English steam wrought manufactures to India, not only supplanted the native manufacture, but also the spinner of the twist. Weaving was too painful a fact to dwell upon in such places as Surat, Dacca and Murshedabad etc where the decay of native manufactures went on. It was not a fair course of trade but was an exercise of power of the stronger over the weaker to fulfill the English interest at large. Same rates of duty should be imposed in India on British manufactures as were levied in England on Indian manufactures,³¹⁵ but the British failed to do so.

³¹⁰ *Ibid.*

³¹¹ *Ibid.*

³¹² *House of Commons (PP 1831-32), vol. 10, Part-II, appendix 5, p. 594.*

³¹³ *Ibid.*

³¹⁴ *Report from Select Committee on East India Produce together with the Minutes of Evidence, Appendix and Index, House of Commons (P.P. 1840, vol. 8), p. 275.*

³¹⁵ *Ibid.*

The British introduced selfish commercial policy since the last quarter of the seventeenth century and continued it till 1825 i.e. over hundred years and by the third decade of the nineteenth century they successfully made India as an importer country of cotton and silk goods. The machine-made products of Great Britain were forcefully introduced into Indian market by the English Company. At the same time in England import of Indian manufactures were shut down by prohibitive tariff.³¹⁶ The political unjustness is understandable from the fact that the cotton goods which could be sold in Britain in 1813 at a price 50-60% less than the price of machine made cloth of England. In those times, the British Parliament levied 70-80% duty on Indian cotton products to drive them out from the British market.³¹⁷ Thus India got gradually reduced from a manufacturing country to an agricultural one.³¹⁸

Due to the aforementioned unjust treatments on the cotton goods of India by the British, the cotton industry of the district of Burdwan, Birbhum and Hooghly as well as the industry of Bengal as a whole gradually got destroyed.

III

The technology and production process of the cotton textile industry of England was more or less same to the Bengal industry before 1760. The English cotton industry started to use many modern power driven machines after 1760, as a result of the technological innovation. With the introduction of the technological innovation, the production process in Bengal and in England had become widely different. Bengal still followed cottage system of production where productivity was low. In England, whole character of the industry changed from the early domestic industry to a large factory based system. By 1800, many cotton mills were established by using new technologies. The spinning Mules provided strong and fine thread to the weavers. The weavers used to run their looms by steam engines. Thus, the English industry had

³¹⁶ Dutt, R., *The Economic History of India Under Early British Rule*, p. 261.

³¹⁷ Quoted in *Ibid*, p. 262.

³¹⁸ Quoted in *Ibid*, p. 262.

developed from a home – based cottage industry to a factory based industry housed in cotton mills. The wealthy merchants began to build mills for the production of cotton yarn and cloth and later it turned to be a profitable investment. Thus, the high productivity and large scale production in England reduced the cost of production and thereby reduced the price of their cotton goods.

In the documents laid before Parliament in 1832-33³¹⁹, there is a calculation regarding the cost of labour for producing yarns in Britain and in India for one pound weight, from No. 40 to 250, and likewise of the value of the labour and material combined. The document shows the great advantage in the cost of labour that England had over India. It shows that on yarn No.40, the cost of cotton in England was 1s. 6d., and for labour was 1s., making 2s. 6d; but in India the cotton costs was 3d., and for labour 3s. 4d.; the cost was therefore 3s. 7d.; on the next yarn spun, where the cost of labour in England was 1s. 6d., in India it was 5s. 8.5d.; on the next yarn, where it was 2s. 2d. in England, it was 8s. 10.5d. in India: and in a similar manner the comparison proceeds through the different qualities of yarn, until upon yarn No.250, where the labour cost was 31s., the labour in India was 83s. 4d. The low priced British yarn entered into the Bengal market since 1787. The spinning branch of the cotton industry began to get affected greatly due to this influx of low cost British yarn. Since then, the cotton weavers of Bengal started to use English machine made yarn extensively and the spinning branch of the cotton industry of Bengal started to decline rapidly. During 1818 – 1836 the export of cotton yarns from England to India increased in the proportion of 1 to 5,200.³²⁰

The weaving industry of Bengal had been affected similarly because the productivity of the English weavers grew considerably. In England the productivity of the weavers was much higher than that of India. According to Martin, one weaver in England

³¹⁹ *House of Commons* (P.P. 1840, vol. 8), op. cit., p. 276.

³²⁰ Quoted in Mukherjee, R., *The Rise and Fall of the E.I.C.*, p.236.

would produce more goods than six weavers in India.³²¹ Thus the weaving branch of the Bengal industry reached a state of crisis by 1830. In 1813 Calcutta exported to London 2 million sterling worth of cotton goods. The scenario completely got reversed by the year 1830. In 1830, Calcutta imported 2 million sterling worth of British cotton goods.³²²

As a result of high growth in productivity in English cotton industry, the prices of cotton products in Great Britain decreased and became much lower than that of Bengal in the first half of the nineteenth century. In 1818, the price of same cotton goods of 20 yds which was made in Haripal and Dhaka were 89 shilling and 155 shilling respectively but was only 55 shilling which was made in England mill.³²³

By the end of the second decade of the nineteenth century, the prices of British machine made cotton goods had become lower than that of Bengal. This price reduction was brought about by virtue of high productivity and large scale factory production, which were the direct outcomes of Industrial Revolution. Besides, the price reduction, the durability and handiness of cotton goods produced in England had increased considerably. These were the main causes for the success of English cotton goods in the World market.

The improvements and inventions of machinery through the Industrial Revolution made it possible for the English industry to outclass the Bengal cotton products from the world market as well as from the home market of India. The British cotton industry was able to produce muslin and calicoes in imitation of the Bengal at considerable low prices which successfully outclass Bengal cotton goods of same qualities. As a result, the cotton industry of the district of Burdwan, Birbhum and

³²¹ *House of Commons* (P.P. 1840, vol. 8), op. cit., p. 276.

³²² Quoted in Mukherjee, R., op. cit., p. 236.

³²³ Tripathi, A., *Trade and Finance in the Bengal Presidency*, p. 165.

Hooghly permanently lost their market at home and abroad and reached a ruinous state by 1824.

IV

The cotton industry of the districts of Burdwan, Birbhum and Hooghly achieved high growth rate in the eighteenth century by virtue of the export trade by the European companies. Under the influence of the European traders, mostly the English East India Company, a commercial transformation occurred in Bengal which integrated Bengal with the world market. The expansion of trade during this period on a significant scale yielded spectacular prosperity of the districts' industry in the period. This sudden boom of the industry did not persist for long. By the turn of the eighteenth century, the industry started to fall and its greatest catastrophe had occurred around 1824.

Among the causes for the decline of the districts' cotton industry, the disappearance of the court culture had no effect behind the decline. The hostile British policy i.e. stringent tariff on Bengal cotton piece goods in England and coercion on Bengal weavers by the British affected the industry to some extent. The hostile tariff restricted only the market for Bengal goods in England and did not restrict the markets in Asia and other countries in Europe. The districts as well as the Bengal cotton textile industry was not highly affected by the tariff policy although it checked the import of Bengal cotton manufactures to Great Britain only. The British Parliament started to impose tariff and prohibition of Indian cotton goods in English market since the last quarter of the seventeenth century. Since then, after a century, the export of Bengal cotton goods was considerable. When we describe the oppression on Bengal weavers in one hand and tariff protection to English cotton industry on the other hand, we can see the hostile British policies like tariff and oppression the growth of the Bengal cotton textile industry was remarkable for more than hundred years. So, the hostile British policy was not a very significant cause behind the decline of the cotton industry in the three districts. The policy had only some detrimental effects on the industry.

Since the first decade of the nineteenth century, the European market for the Bengal cotton goods decreased to a large extent due to the Napoleonic Wars. Napoleon banned the import of goods from England and its colonies into the European market.³²⁴ As a result, Bengal lost her vast market for cotton piece-goods. In those times, a large quantity of Bengal piece-goods was dumped in the Company's warehouses in England.³²⁵ Consequently, the English Company's export of Bengal cotton piece-goods reduced to a considerable extent and it compelled the Company to reduce their investment in the districts on cotton manufactures. At the same time, a complete cessation of silk import from Italy to England took place on account of the Napoleonic Wars³²⁶ as a result of which the demand for Bengal raw silk for the silk industry in England grew to a large extent. The decline of cotton goods export coupled with the rise in silk demand instigated the Company to invest on the procurement of raw silk from the districts and special attention was given on cultivation of raw silk. As a result, the total production of raw silk in Bengal nearly doubled in few years.³²⁷

By 1815, the European war had come to an end. After the conclusion of the war the English machine made cotton piece-goods started flooding the European as well as the world market which had been dominated by cotton manufactures of Bengal over a long period of time. Thus the Bengal cotton industry gradually lost its export outlets and for the lack of any patronage, the industry reached a state of crisis. The cotton goods of Manchester outclassed the Bengal cotton products from the markets of Great Britain and other European countries, America and Asia.³²⁸ At the same time, British machine made goods captured the home market of India by replacing the Bengal

³²⁴ Ray, I., Identifying the woes of the cotton textile industry in Bengal, *The Economic History Review*, Nov. 2009, vol. 62, issue 4, p. 11.

³²⁵ WBSA, *Proceedings of Board of Trade* (Commercial), 17 March 1809.

³²⁶ WBSA, *Proceedings of Board of Trade* (Commercial), Sept. 2, 1808.

³²⁷ WBSA, *Proceedings of Board of Trade* (Commercial), 22 April 1814.

³²⁸ Ghosal, H.R., *Economic Transition in Bengal Presidency*, pp. 30-31.

goods. In those days, Dubrajpur of Birbhum district was a big market of *garha* cloths which became a market of English piece-goods.³²⁹

This chapter analyses the effects of the disappearance of the court culture, the discriminatory British policies and the technological innovation in Great Britain on the cotton industry of Birbhum, Burdwan and Hooghly districts. This study observed that the disappearance of court culture did not have any effect on the districts' industry. The stringent tariff checked the import of cotton manufactures of the districts to Great Britain. The British Parliament started to impose tariffs and prohibitions on Indian cotton goods in English market since the last quarter of the seventeenth century. After a century i.e. up to the second decade of the nineteenth century, in spite of those tariffs and prohibitions, the export of Bengal cotton goods was considerable. When we analysed the oppression on Bengal weavers in one hand and tariff protection to English cotton industry on the other hand, we could observe that in spite of these hostile British policies the growth of the Bengal cotton textile industry was remarkable for more than hundred years. So, we cannot safely conclude that the hostile British policy was a very significant cause behind the decline of the districts' industry, although it certainly had some detrimental effects on the industry.

Thus the oppression and the prohibitive tariff were not the leading factors behind the decay of the districts' cotton industry. The point is that even if there had been no hostile tariffs and no oppression the decay of the industry could not have been prevented long on account of the mighty force set in motion by the mechanical revolution. It was the Industrial Revolution, which enabled England to supplant the cotton manufactures of the districts not only outside, but within our own country itself when improvements and inventions of machinery made it possible by the British industry to produce muslin and calicoes in imitation of the Bengal at much lower prices so that it enabled to surpass the Bengal cotton producers both in terms of prices and quality.

³²⁹ Sherwill, W.S., *Geographical and Statistical Report of the District of Birbhum*, p. 20.

The findings of the chapter, directs us to conclude that among the factors behind the decline of the districts' cotton industry, technological innovation was by far the most powerful.

Chapter -VII

Chapter -VII

Summary of Observations and Conclusions

The earlier chapters have been analysed various aspects of the cotton textile industry in Bengal during 1757-1857 in comparison to the cotton textile industry of Great Britain which progressed through the Industrial Revolution in that period. The main thrust area of those chapters was the status of the industry in three districts of Bengal, viz Birbhum, Burdwan, and Hooghly during the period under study. The earlier discussions have shown the rise and fall of the cotton industry in those districts under the domination of Bengal trade as well as the administrative and political control over Bengal by the English East India Company.

Now, this chapter seeks to summarise the observations and conclusions that the earlier chapters have made.

I

The major observations and conclusions of chapter II are as follows.

1. From the time immemorial, the cotton industry was by far the most important among all rural manufactures and industries in Bengal. Here, the cotton fibre was used for the manufacture of cloth for at least 4000 years. The various earlier records showed that the superior muslin and calicoes of Bengal were exported to abroad from very early period. In the Mughal period, the industry was in flourishing condition through the patronage of the Mughal Emperors and their provincial rulers.
2. Since the beginning of the sixteenth century, the cotton piece-goods of Bengal, i.e. muslin and calicoes were exported by the European traders through ocean route to different parts of Asia and Europe. The pioneer in this maritime trade was the Portuguese, followed by the English and the Dutch—who founded joint-stock companies in the early seventeenth century in

Bengal, known as the English East India Company and the Dutch Verenigde Oostindische Compagnie (VOC). A considerable quantity of Bengal piece-goods were used to be exported by the English traders. In 1628, the annual export of calicoes from Bengal to England was 50,000 pieces. Since the middle of the seventeenth century, the Bengal's calicoes flooded the world market. In 1677, England alone imported Bengal's calicoes to the value of £1,60,000. Besides the English, the Dutch also exported a considerable quantity of Bengal calicoes and ordinary muslins to Japan, Siam, Moluccas, Ambionia, South Africa, Arabia, Persian Gulf, Egypt, etc. Since the beginning of the eighteenth century, the English East India Company started to dominate Bengal trade. Before 1757, the Bengal cotton piece-goods flooded the world market due to its singular beauty, endless variety, and low price. The average price of Bengal calicoes in the seventeenth century was 7 Seer per piece which was sold in England at 20 Seer per piece.

3. The cotton industry of Bengal was a rural domestic handicraft industry. The process of production was very simple and crude, and in it very cheapest and rudest apparatus were used. The main stages of production were spinning and weaving. Generally the women of all caste were engaged in spinning. Weaving was done by the people of weaver caste. Although, for the production of large quantities of goods, a weaver used to hire labour from outside the family. In the early period, before the European traders came in, the weavers used to produce independently. They usually belonged to a guild and would follow the regulations of the guild. When the production of cotton piece-goods increased by the export demand of the European traders, the earlier independent producers used to work under the *Mahajans* who used to pay advance money to the weavers for the supply of clothes at a fixed price. During the first half of the eighteenth century, the British East India Company captured the Bengal trade. The Company established many factories and collected cotton goods by 'dadni system'. But around the middle of the eighteenth century, the Company discarded the system of 'dadan' and started

to procure goods by ready money. This new system of ready money purchase broke down due to many disadvantages. Around 1757, the 'dadni system' as well as the system of ready money purchase had collapsed altogether and a new system emerged for the second half of the eighteenth century and latter.

4. The prices of cotton piece-goods of Bengal vary in a large extent as large varieties of goods were produced. Among all varieties, the Dhaka muslins were the costliest. Around the middle of the eighteenth century, a piece of Dhaka muslin was even priced Rs. 450. But the Dhaka muslins which were exported by the Dutch and the English were only Rs. 31 - 43 per piece. The price of muslins of other districts was cheap and its price varies from Rs. 11-29. Besides muslin, the price also varies for calicoes of different varieties. The fine calicoes of different districts were usually cost between Rs. 11-12.5. The price of coarse calicoes varies from Rs. 8.5-9.
5. In Bengal at one time the entire amount of raw cotton used by her cotton industry was produced locally. Cotton was cultivated in many districts of Bengal. A finest quality of cotton was produced in the vicinity of Dhaka which was used for the production of fine muslin. As demand for cotton manufactures of Bengal increased considerably, the Bengal industry had to import raw cotton from Surat, Doab, Berar, and certain parts of the Deccan.

II

During 1757-1857, the English cotton goods were the main competitor of the Bengal cotton goods in the world market. The Bengal cotton industry had to face severe competition from the English cotton industry when latter progressed rapidly due to Industrial Revolution. In the first half of the nineteenth century, the Bengal industry was defeated by the English cotton Industry for various reasons. Chapter III compares the technological and economic factors between the two countries and identifies the actual reason(s) behind the defeat. The important observations and conclusions of chapter III are as follows.

1. Before 1760, the technology of production of the cotton industry both in Bengal and in England was more or less same. After 1760, due to technological innovation in England, difference in the production organisation of the two countries widened. The Bengal industry still remained a cottage industry and carried on with simple and rudest apparatus. The English industry had developed from a home-based cottage industry to a factory based industry housed in cotton mill where modern power driven machines were used. Through the technological innovations, the English cotton industry reached in leading position by the second quarter of the nineteenth century. Since then, English piece-goods successfully outclassed the Bengal piece-goods from the market of England as well as from the world market.
2. In the seventeenth century, the Bengal cotton piece-goods flooded the English market due to its high quality and low price, and this trend continued till the first half of the eighteenth century. The cost of production in Bengal was much lower than that of England due to its abundance of labour together with the cheapness of staples like rice, wheat, and yarn. Besides these the fixed cost of production was also very low as looms were build in weavers' house with very low expenditure and cost of implements were also very low.

After the Industrial revolution particularly after 1760, the use of advanced machines and new factory system of production in England, the large scale production became possible in English cotton industry. Due to its large scale production and high productivity growth in England, the average cost of production for the cotton piece-goods in England was lowered than that of Bengal. Although the wages of labour still remained lower in Bengal than that of England.

The low cost of production and thereby low price of English cotton piece-goods and outcome of the technological innovation in Great Britain were the major driving force for successful displacement of the Bengal piece-goods from their home as well as in the world market.

3. When the large scale factory system of production started in England for the production of cotton piece-goods, the requirement of raw cotton increased many times and the availability of raw cotton could have been single limiting factor of production. But the English industry used to get ample supply of raw cotton from America and other British colonies. On the other hand, Bengal cotton industry imported cotton from different parts of India during the period under review.

The average price difference of raw cotton was insignificant between Bengal and England, rather the raw cotton price was lower in Bengal. So, the availability of raw cotton and its price were not highly responsible for the lower price of finished goods of English cotton industry in the home market of England as well as in the world market.

4. To protect the English cotton industry, the British parliament implemented many protective measures. It imposed high tariff on imported Bengal piece-goods. On the other side, the British imposed many coercive measures on the Bengal weavers. The coercion on the weavers and absence of any state patronage since the fall of Mughal Emperor altogether made it possible to displace many a cotton weavers of Bengal from their hereditary profession. To protect the cotton industry of England, the British Parliament enacted various Acts to prohibit the entry of Indian goods in English market since 1700. Even after the imposition of various tariffs, the export of Bengal cotton goods was considerable till the second decade of the nineteenth century.

The oppressive measures on the Bengal weavers and the prohibitive tariffs on the Bengal piece-goods in England were not the important causes behind the defeat of the Bengal cotton industry. These, however, had prejudicial effects on the Bengal industry. Even if there had been no hostile tariffs and no oppression by the British, the downfall of the Bengal industry could not have been prevented long on account of the mighty force set in motion by the mechanical revolution. The technological innovation allowed the English

cotton industry to produce muslin and calicoes in imitation of the Bengal at such a low price that it eliminated the Bengal cotton piece-goods from the world market as well as in the home market of India.

III

In three districts of Bengal viz. Birbhum, Burdwan, and Hooghly, the rural manufacture and industry grew besides agriculture. Among all the rural manufactures in the districts, cotton piece-goods were by far the most important in the period under review. To explain the status of the cotton industry of those districts in the period, the major observations in chapter IV are as follows.

1. Since the beginning of the seventeenth century, European traders started to settle in different parts of the districts for trade. Among them, the Portuguese was the first to come, followed by the Dutch, the English, and the French traders. The European traders established many *aurungs* or factories in different manufacturing centres of the districts. The English East India Company became the most powerful traders in the districts after the achievement of the imperial Farman from the then Mughal emperor, Farrukhsiyar in 1717 for duty free trade. The English Company established many *aurungs* in different parts of the districts where the production of cotton cloths was concentrated. The district of Birbhum was popular for the production of *garha* cloth (a type of calicoes) and its different manufacturing centres were Supur, Alunda, Ilambazar, and Surul. Purbasthali, Katwa, Kalna, Manteswar, Memari, Jamalpur, Burdwan town, and Mundalghat were the important manufacturing centres in the district of Burdwan where different types of calicoes and muslins were produced. The district of Hooghly was famous for its plain white muslins and different types of calicoes. The important cotton goods manufacturing centres of the district were Haripal, Durhatta, Dhaniakhali, Mayapur,

Chadoolea, Khurswurroy, Gollagore, Gaulpara, Khawnpore, Gurup, Mazenan, Hooghly, Barnagore, and Chandernagore.

2. The factories or *aurungs* of the British East India Company used to work under the control of the Council in Calcutta. A factory consisted of a chief, some assistants, some soldiers and *sepoys*. The list of merchants, *gomastas*, and all others who were engaged by the factories should be duly forwarded to the Council. The Council used to verify the products which were supplied by the factories. The factories used to procure goods through *dadni* system for which the advances were given to the *dadni* merchants to supply goods to the factories. Those advances were called the Company's investment. The merchants used to give advances to the weavers who were registered to work for the Company. The *dadni* merchants very often could not maintain their contracts. To overcome the problem, since 1746, the Company tried to procure goods by ready money. Due to many difficulties, the ready money system did not last for long. Since 1753, the Company introduced a new system of purchase through the Commercial Resident. A Commercial Resident was the in-charge for the management of a Commercial Residency and was directly subordinate to the Board of Trade. In this new system, *gomastas*, *mohurees*, cash keepers, and *tegadars* were employed for the procurement of goods from the weavers. Cotton goods were transported from the interior production centres by river routes. As many weavers' hamlets were situated far away from water courses, the principal means of transport of cotton piece-goods was pack bullocks, whereas coolies and bullock-carts were the subsidiary ones.

The system of investment through the Commercial Resident in the period under review was a very convenient mode of procurement of cotton goods by the English Company.

3. In the districts, the cotton textile industry was a domestic rural handicraft industry. There were the following stages of production: The first two stages were freeing the raw cotton from seeds and bowing. The next stage was spinning, which usually was done by the women of all castes. The average earning of a spinner varied from 1 Rupee 6 annas to 1 Rupee 11 annas a month. After spinning, the next stage was weaving. Unlike spinning, weaving was confined to a particular caste of Hindus and a particular section among the Muhammadans. The average earning of a weaver per month in the districts varied from 3 to 4 Sicca Rupees. Washing of clothes was also an important process. The usual rate of a washer man was 2 Rupees for 20 pieces of clothes. The cotton clothes were coloured by the indigenous dyers of the districts who used indigo, lac, and mulberry for dyeing. The *aurung* prices of cloths were determined by the costs involved in different stages of production. When the cotton goods were arrived at Calcutta port some other costs were added to the *aurung* price. The *aurung* price of a piece of clothes varied according to their quality from 3.35 Sa. Rs. per piece to 9.07 Sa. Rs. per piece.
4. Three sorts of cotton were produced in the districts which were *caur* or *nurma*, *muhree* and *bhogee*. In the districts of Burdwan and Hooghly, all the above three sorts were produced but in Birbhum district only *bhoga kapas* was produced. The *nurma kapas* was the finest of all and the price was on average Rs. 6 per maund. The *muhree kapas* was inferior to *nurma* and the average price was Rs. 5 per maund. The *bogha kapas* was a coarser variety and the average price used to be Rs. 3 to Rs. 4. In 1848, the total production of the districts of Burdwan, Hooghly, and Birbhum were 5,60,000 lbs, 4,95,000 lbs, and 99,900 lbs, respectively. The production of cotton in the districts was less than the demand created by the domestic cotton industry and the industry had to depend on imported cotton. Cotton was imported from different parts of India such as Nagpore, Ammarabatty, Pulpara, and Bombay. The industry in Burdwan district alone imported

one lakh maund of *kapas* per year. In 1790, about 17,000 maunds of *kapas* were imported into the district of Birbhum.

5. The cotton textile industry of the districts provided employment to a large portion of the population in the districts either as part-time or full-time engagements. The spinning was carried out by the women besides their household works. As like spinning, weaving was a part-time occupation for a considerable section of the total population who had normal engagement in agriculture. Usually those part-time weavers were engaged in the production of coarser cloths. Full-time weavers were the specialised weavers who used to produce fine muslins and calicoes. Due to lack of sufficient data, it is not possible to estimate accurately the total number of people who were engaged in the industry of the districts. The available data exhibit that there were 4000 weavers in Sonamooky *aurang* in 1787, 4002 weavers in Gollagore *aurung* in 1804, and 1400 weavers in Chandernagore *aurung* in 1810. In the district of Burdwan, during 1813-14, the total number of people belonging to *Tanti* (weaver) caste was 27,180.

IV

The cotton industry in the districts of Birbhum, Burdwan, and Hoohgly achieved the highest growth rate in the second half of the eighteenth century with the investment of capital by the European traders particularly by the British East India Company. But, the growth momentum did not persist for long. The once prosperous industry of the districts was caught in crisis by 1824. The major findings in this regard are highlighted in chapter V as follows.

1. The cotton industry of the districts gave employment to many people of the three districts. Next to agriculture, the industry was the largest employment generating sector of the districts. In 1798, the number of

weavers in the districts was 2,09,700 as per available data. If we assume, in an average there were six members in a family who were dependent on the income of one weaver, then it can be inferred that the industry provided the livelihood to over 4,19,400 people of the districts. Since the beginning of the nineteenth century, the number of weavers in the districts gradually diminished and reached extremely low around 1824. It exhibits that the industry of those districts reached the gloomy state by 1824.

2. The commencing period of the decline of the industry of those districts can be identified by its consumption of raw cotton. Although cotton was cultivated in the districts, a large quantity of cotton was imported from different parts of India. In the first half of the nineteenth century, the production of raw cotton and its price simultaneously decreased. At the same time, export of cotton was started from Bengal and gradually increased thereafter. That export also did not create any upward pressure on the price of cotton in the market of those districts. This price trend shows the decline of the consumption of cotton by the industry of those districts. Due to the lack of demand for cotton in the the industry of those districts, the Mirzapur cotton mart started declining since 1820 which was the largest supplier of cotton to the industry. From the view point of cotton consumption, the decline of the industry started around 1820.
3. In post Plassey period, the production of the cotton industry of the districts was very much dependent on the investment of the British East India Company. In the second half of the eighteenth century, the investment increased gradually in the districts. Since the early nineteenth century, the investment started to decrease rapidly. The fall of the investment in the first decade of the century can be explained by the Napoleonic Wars and continental blockade. But after the

conclusion of the war in 1814-15, the investment of the British Company did not increase on account of the fall of the export market for Bengal piece-goods. By that time, the English machine made cotton piece-goods had been able to capture the world market which at one time was dominated by the Bengal goods. The districts industry reached in real crisis after 1820.

4. Some contemporary evidences show unhealthy features of the industry of those districts in early nineteenth century. The cessation of investment by the British Company in different *aurungs* occurred in 1824 in the district of Hooghly. In 1824, the investment of the Company was withdrawn completely in all the *aurungs* of Birbhum and Burdwan districts which were the sub-ordinate *aurungs* under the Sonamooky factory. It appears from the contemporary evidences that the acute phase of recession of the industry of those districts started by 1824.

V

To identify the cause(s) behind the decline of the districts' industry, Chapter VI has been generated the following major findings.

1. The demand for some price-worthy Bengal muslins had come to an end through the disappearance of the royal Court of the Mughal Emperors and their provincial rulers. Those muslins were manufactured in royal *karkhanas* in the district of Dhaka only. The disappearance of demand for those muslins in no way affected the cotton industry in the districts of Birbhum, Burdwan, and Hooghly.
2. One of the British hostile policies was coercion on the Bengal weavers which certainly had negative impact on the industry of those districts. Since 1757, the British East India Company became the ruler of Bengal and since then it applied many oppressive regulations on the

weavers of the districts to procure cotton goods of the districts with minimum possible low cost and thereby to maximise profit from the export trade. Those exploitation of the Company forced many weavers of the district to quit their age- old hereditary profession.

3. Other British hostile policies were imposition of stringent tariff on Bengal cotton piece goods in England by the British Parliament and implementation of various Acts to prohibit the entry of Indian cotton goods into England. Since the early nineteenth century, the rates of duty on Indian muslin, calicoes gradually increased. In 1813, the ad valorem duty on white calicoes reached around eighty five per cent as compared to forty four per cent on muslins. Up to 1825, the duty remained more than sixty per cent on the white calicoes and more than thirty per cent on the muslins. In 1826, the duty was drastically reduced to ten per cent ad valorem on calicoes and on muslins and since then, the tariff rates started going down. These selfish commercial policies of the British have severally reduced the English market for Bengal cotton goods and it definitely had some prejudicial effects on the industry of those districts.
4. The period under review was an important period when the Industrial Revolution took place in England and emerged as strong force behind the decline of the industry of those districts. The different technical inventions reshaped the production of cotton textiles in England. Among the early inventions, Kay's flying shuttle, Paul's carding machine, and Hargreave's spinning jenny were very important. The English industry had developed from a home-based cottage industry to a factory based industry housed in cotton mills. The wealthy merchant started to build up mills for the production of cotton yarn and cloth, which turned out to be a profitable business. As a result, the productivity of English industry increased by many folds and was able

to produce muslin and calicoes in imitation of Bengal at a comparatively low cost; and the cotton products of the districts as well as Bengal were supplanted by the English cotton goods.

5. Among the factors behind the decline of the industry in the districts, technological innovation was by far the most important. It was imperative that, even if there were no hostile tariffs and no oppression by the British, the decline of the districts' industry would have taken place in the face of the mighty force set by the mechanical revolution.

VI

The overall major findings can be summarised as follows:

The cotton handicraft industry in the districts of Burdwan, Birbhum, and Hooghly was the greatest of all handicraft industries which grew from the days of antiquity. If we consider the total period under review, the period during 1757-1800 witnesses a success story of the districts' industry whereas the rest of the period is a gloomy phase for the industry. The industry played a very vital role in the contemporary economy of the districts. It slipped from the place of prominence in the end of the first quarter of nineteenth century which had far-reaching impact on the economy of the districts as it gave livelihood for a considerable size of population of the districts from the days of antiquity.

The depression of the cotton industry of the districts started since the early nineteenth century to Napoleonic Wars. But that condition did not revive even after the conclusion of the war around 1815. The real disaster occurred by 1824.

The districts' industry, met with real hardship both at home and abroad in an unequal competition with the cheaper machine-made cotton piece-goods of England. The imposition of prohibitive tariff by the British

Parliament drastically curbed the European market for Bengal cotton goods. In spite of the high quality, the demand for cotton piece-goods of the districts was severally curtailed. As a result of the technological backwardness, organizational weakness, financial crunch and lack of state patronage, the cotton industry of the districts proved to be a poor competitor with the powerful Manchester capitalists. By 1824, the districts' industry collapsed and thousands of people in the districts were rendered jobless.

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