

South Korean Economic Development and the Concentration of the Textile Industry in Taegu Since the 1960s*

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Abstract : The concentration of the textile industry in Taegu, South Korea since the 1960s is investigated from two geographical scales, local and national.

The main features of South Korean economic development are 1) the strong government, 2) the establishment of a few large companies(Chaebols), 3) the changing structure of the labor market, and 4) uneven spatial development. The textile industry of South Korea developed within the context of national economic development after the early 1960s.

The textile industry of Taegu has been (re)produced by the interactions among the local administrative government, local textile capitalists, and local workers during the processes of economic development of South Korea. Local agents - the city government, local capitalists, and local workers - played an active role in (re)producing the local textile industry, although their actions were constrained by national economy and politics as well as the international political economy.

Key Words : national economic development, strong government, uneven spatial development, textile industry, labor market

요약 : 경제, 사회 지리학에서 중요한 연구 과제들 가운데 하나가 어떠한 경제 활동이 특정 지역에서 일정한 기간 동안 집중화를 보이는 현상에 대한 설명과 전망이다. 본 연구의 중심은 1960년 이후 우리나라 경제 발전 과정에서 특히 대구라는 지역에서 섬유 산업(섬유 직물)이 왜 집중적 발전을 보이는가이다. 섬유 산업의 대구 집중화 현상을 설명하기 위하여 두 개의 상이한 지리적 공간(지역과 국가 규모)의 상호 작용을 가정하였다. 즉, 국가의 정치, 경제와 지역의 행정, 자본, 그리고 노동이란 측면에서 고찰하였다.

섬유 공업이 대구에 집중화한 현상은 1960년 이후 한국의 경제 발전과 관계가 있는 산업과 노동 정책, 지역의 섬유 자본, 그리고 지역 섬유 노동의 상호 작용 속에서 잘 설명될 수 있다. 대구의 섬유 공업은 1970년 이전에는 풍부하고 저렴한 노동력과 국가의 노동 집약적 경공업 정책에 의해서 발전했고, 그후 국가의 산업 정책, 경제 구조, 노동 조건, 세계 경제의 변화에 적응하기 위하여 섬유 자본가의 다양한 생존 전략과 지방 행정부의 정책에 의해서 지속될 수 있었다. 그러나 1980년 이후 대구의 섬유 공업은 지역 경제의 구조적 위기에 직면하면서 재구조화가 진행되고 있다.

주요어 : 국가경제발전, 강한정부, 불균등 공간발전, 섬유산업, 노동시장

1. Introduction

This study is to investigate the concentration of the textile industry in Taegu, the third largest city

of South Korea. The rapid economic development of South Korea since the 1960s has spatially divided certain types of industrial activities such as the textile industry in Taegu, the steel industry in

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Pohang, the heavy and chemical industry in Ulsan, and the machine industry in Ch'angwon. This unequal spatial development has created economic, social, and political problems. After the mid-1970s, the textile industry of South Korea declined large cities and provinces except Taegu and Kyongbuk province. Taegu and Kyongbuk had more than 35 percent of the national textile employment in 1984 (Lee, et al., 1988). The research question is how the textile industry has been concentrated in one particular city, Taegu, in the process of the economic development of South Korea after the 1960s.

It is generally known that the uneven regional development of South Korea has caused various social and political problems. Even if people understand the importance of that subject, there are only a few empirical studies (Cho, 1991; Cho, 1993; Kim, 1992; Kim, 1992). This study will add insights to political and economic perspectives on the rapid economic development of South Korea by explicitly considering two geographical scales, national and local.

My fieldwork was carried out in Taegu, South Korea, from May 1995 to January 1996. It consisted of two parts. The first task was to collect national and local official statistics, the documents of city government and private companies, and reports of previous surveys. In general, there was not much primary information (e.g. companies' management records, documents of local government's policy, workers' writings, and so on) about Taegu's textile industry, even though the textile industry has been dominant in the city's economy during the last four decades. The second task of the fieldwork was to do informal interviews with local textile manufacturers, workers, and a few others such as university professors and members of local labor organizations. I have interviewed representatives of 16 textile companies which are located in Sogu, Talsogu, and Pukku, Taegu. I also interviewed 47 textile workers at those places.

2. The Strategies of South Korean Economic Development and related Textile Industry since the 1960s

This part will briefly explain how South Korea has rapidly developed its economy and related textile industry since the 1960s. At least until the mid-1980s after the early 1960s, the South Korean government was a strong development state (Amsden, 1989; Kim, 1993; White et. al., 1988). Table 1 summarizes the characteristics of three policies in national development planning as well as type of politics after 1960.

Until the early 1970s, the economic development of South Korea was based on light and labor intensive consumer goods. After that, the South Korean economy was more oriented to production goods than consumer goods due to the government's heavy and chemical industrialization. So the main source of capital accumulation was changed from consumer goods to production goods. After the early 1960s, large manufacturing companies (Chaebols) were dominant in the economic development of South Korea, and they were strongly supported by the government's economic and labor policies. However, many small and medium companies had to operate their business under competitive market conditions.

Table 1. Politics and policies in the economic development of South Korean, 1960 - 1990

	1960	1970	1980	1990
Type of politics	Authoritative and developmental			Pluralistic
Industrial development policy	Light and labor intensive oriented		Heavy and chemical oriented	
Labor policy	Labor repression			Adjustment
Spatial policy	Laissez faire		Uneven spatial accumulation	Spatial expansion of accumulation

After the mid-1970s, the numbers of subcontracting companies were increased due to the increase of wage and international competition. This means that many small companies were largely controlled by the production and marketing strategies of large companies.

South Korean workers were generally repressed by both the government and capitalists at least until 1987 when many labor strikes occurred. Table 2 represents the conditions of the workforce in the economic development of South Korea from 1960 to 1990. Until the mid-1970s, the educational level of the workforce, particularly unskilled workers was generally primary and middle school, and labor market was surplus due to the lack of job opportunities and large scale population movement from rural to urban. After that, the education level of workers was changed from primary and middle school to high school and labor market was shortage due to the increase of income and job opportunity. Wages and jobs in the labor market were generally differentiated in terms of education, gender, and skill.

The government started the first spatial planning at a national level in 1972, and its second national planning was implemented after the early 1980s (Institute of National Territory Development, 1996). The former was based on uneven spatial accumulation strategy whose purpose was mainly to implement the government's heavy and

chemical industrialization, and the latter emphasized the spatial expansion of the capital accumulation achieved in the 1960s and 1970s.

There is no doubt that textile industry took an important role in the economic development of South Korea after the 1960s (Song, 1990). After the 1970s, however, the importance of the textile industry was declined in South Korean economy (Tab. 3). The ratio of textile exports to the South Korea's exports as a whole was 33.3 percent in 1970 and 22.6 percent in 1990, and in terms of value added, the share of the textile industry to all of manufacturing as a whole was 19.0 percent in 1970 and 8.7 percent in 1990.

The production of the South Korean textile industry shifted from natural textiles to chemical textiles after the 1970s. In terms of the production of textile fiber and fabric, the chemical textile industry became dominant after the 1980s. The ratio of the chemical fiber and fabric production to the natural textile fiber and fabric production as a whole was

Table 3. The changing position of textile industry in South Korean economy, 1970 - 1990

	1970	1974	1980	1984	1990
Value added of manufacturing industry (A) (billion won)	560	1,173	14,426	15,172	43,954
Value added of textile industry (B) (billion won)	106	154	2,363	2,089	3,817
B/A (%)	19.0	13.1	16.4	13.8	8.7
Exports of economy as a whole (C) (million dollar)	1,003	4,712	17,505	29,245	130,374
Exports of manufacturing industry (D) (million dollar)	839	4,252	16,151	27,787	61,728
Exports of textile industry (E) (million dollar)	334	1,460	5,014	7,079	14,670
E/C (%)	33.3	30.9	28.6	24.2	22.6
E/D (%)	39.8	34.3	31.0	25.5	23.8

source : Korean Federation of Textile Industry, 1976, pp.27-29; 1993, p.10; and 1995, p.10.

Table 2. The conditions of the workforce in the South Korean economic development since 1960

	1960	1970	1980	1990
Level of education				
Labor market				
Wage and job				
Labor movement				

54.1 and 67.0 percent in 1989 (Im and Lee, 1993). Textile goods produced in South Korea were consumed in both domestic and foreign markets. After the 1970s, the textile products of South Korea were largely dependent upon foreign consumer markets due to the government's export-oriented industrial policies.

Two aspects of the government's policy regarding the development of the textile industry after the 1960s are particularly important: the regulation of overcapacity in textile production and the modernization of the South Korean textile industry (Kim, 1994; Department of Commerce and Federation of Textile Industry of South Korea, 1989). From the mid-1960s to the late 1970s, one concern of the government was to regulate the expansion or new establishment of textile production facilities through temporary law on the facility of the textile industry (Somyugongope kwanhan imsijoch' ibop) enacted in 1967 (Department of Commerce and Federation of Textile Industry of South Korea, 1989). Under this law, the government adopted a permit or licensing system to regulate investment in all the segments of the textile industry except garment production. Capacity control could be exercised in a way that allowed inefficient textile firms to exit their businesses gradually. In 1979, temporary law on the facility of the textile industry was replaced by the law, promotion law of the modernization of textile industry (Somyusanop kundaehwa ch' okchinbop). Under the law of 1979, the government implemented three actions for advancing the South Korean textile industry: the reduced regulation of investment and facility expansion; the establishment of funds for textile modernization and the replacement of old textile machines; and the development of technology and the (re)production of skilled workers through the establishment of research and educational institutions (Department of Commerce and Federation of Textile Industry of South Korea,

1989). Under promotion law of the modernization of textile industry, the government tried to support the development of technology and fashion design of private companies. The government also established institutions for the technical support of private textile companies and the production of skilled workers.

In sum, the economic development of South Korea from the early 1960s to the mid-1980s was achieved by the government's strong developmental policy, a few Chaebols' monopolistic or oligopolistic power, and strong labor repression. However, South Korea did not consist of homogeneous social and economic space. It was spatially differentiated in the process of economic development (or capital accumulation). The textile industry of South Korea had developed within the context of national economic development from the early 1960s to the late 1980s. Until the mid-1970s, the textile industry developed through the exploitation of cheap and unskilled workers and the government's export policy. After that, the textile industry was forced to use various strategies to solve the shortage of cheap and unskilled workers, the increase of workers' wages, and the increased competition in the world markets. The importance of the textile industry in the economic development of South Korea was reduced because heavy and chemical industries became dominant in the country's economy after the 1980s.

3. The Roles of Local Administrative Government in the Development of Taegu's Textile Industry

In the (re)production of its main economic force, the textile industry, the Taegu city government actively promoted the development of the local textile industry through: 1) the establishment of local industrial districts and 2) the supply of labor force in local (textile) manufacturing industries

through the education system.

I will focus on the role of the city government for supplying labor force in local (textile) manufacturing industries. The city government took some steps to supply both workers and managers to the local textile industry through the educational system. Educational institutions related to the supply of Taegu's textile workers and managers include primary, middle and high schools, and university.

University education is important for the supply of middle managers, technical researchers, and even owners of the textile industry in Taegu. Table 4 represents the location of the universities which have departments of textiles and clothing. A majority of the universities with a department of textiles and clothing, 8 out of 15 universities, are located in Seoul. Taegu and Kyongbuk province have three universities which have departments of textiles. The students who graduate from those university will generally get jobs in Taegu and its neighboring areas. A textile professor whom I met said that the textile department of Youngnam university in Kyongsan city has been expanded and that it recently received funds for the development of high textile technology (my

interview, December 1995). University education will play an important role in the supply of workers and middle managers in the future of Taegu's textile industry.

The main sources of non-skilled workers in the local textile industry were the students graduating from primary, middle, and high schools in both Taegu and its neighboring areas. Table 5 represents the numbers of student of various departments in the vocational high schools of Taegu since the early 1980s. Males were the majority in manufacturing industry oriented departments in the city's vocational high schools, while females were mostly in commerce oriented departments. From 1982 to 1995, for example, all the students of heavy and chemical department in Taegu's vocational high schools were male. Such gender differences influenced job assignments in the city's manufacturing industries. In the city's textile industry, male worker's jobs were usually related to the repair and maintenance of textile machines, and female worker's jobs were the simple operation of the machines and office maintenance and accounting. According to my fieldwork, there were many young females who graduated from commercial high schools and got simple office jobs or were employed in the simple and repeated operation of spinning and weaving machines in the textile industry of Taegu. Another research shows that many textile business people in Taegu consider vocational high school as an important institution

Table 4. The location of the university having the department of textile, South Korea

Location	Name of university
Seoul and Inch'on	Seoul national university
	Hanyang university
	Konguk university
	Kyonghui university
	Tanguk university
	Songgyunkwan university
	Sungjon university
	Inha university
Taegu and Kyongbuk province	Kyongbuk national university
	Yongnam university
	Kyongbuk sanop university
Pusan	Pusan national university
Taejon	Chungnam national university
Chonju	Chonbuk national university
Kwangju	Chonnam national university

source : Institute for the Advancement of Textile Industry, 1995, p.292.

Table 5. The numbers of students in the vocational high schools of Taegu, 1982-1995

	Department of heavy and light industry		Department of light industry		Department of commerce	
	Total	Female	Total	Female	Total	Female
1982	10,652	none	7,340	2,395	29,335	20,489
1984	6,708	none	6,052	2,725	20,617	14,886
1991	7,583	none	3,114	none	15,191	11,693
1993	10,972	none	3,413	none	14,950	11,582
1995	15,009	63	4,244	155	16,170	12,783

source : Yearbook of Education in Taegu, various years.

for the training of textile workers (Institute of Development of Taegu and Kyongbuk, 1993).

The textile industry of Taegu had problems in a stab. supply of unskilled and low paid workers after the late 1970s. To solve the problem, the city government established special classes for manufacturing workers (Sanopch' e t' ukpyolban) within regular vocational high schools and company operated schools for workers (Sanopch' e pusolhakkyo) after the late 1970s:

"Sanopch' e t' ukpyolban is an educational system where general high schools have made special classes(mainly night class) for factory workers whose tuition is paid by workers' company. Sanopch' e pusolhakkyo is a system of middle or high schools established by large private companies through the formal permission under the establishment of schools and its students are the workers of the company. This kind of educational system gives some benefits to both company owners and workers. The factory workers who gave up higher education mainly because of poverty will have a chance to study further. From the perspective of private business people, such an educational system will give their company a stab. supply of workers at least for three years" (Institute for the Advancement of Textile Industry, 1990, p.496).

Most of the students of special classes and company schools were female and most of them textile workers. In 1985, 5,505 out of 5,815 students of special classes in Taegu were female. Among the 2,012 new students of the special class in 1985, 1,866 students were textile workers, and they were supported by 75 textile companies in Taegu (Institute for the Advancement of Textile Industry, 1990). Taegu' s neighboring cities such as Kyongsan and Kumi also have several schools which offer the special classes. There were about 200 private companies in Taegu which supported special classes.

In sum, there is no doubt that the local government has played an active role in the supply of both unskilled and skilled workers to (re)produce the city' s textile industry through the establishment of an educational system. Also the

educational system is dynamic due to the changing structure of local textile industry.

4. The Production System of Taegu' s Textile Industry Since the 1960s

The production system of local textile industry will be investigated in terms of production, marketing, and finance. Since the 1960s, a few large chemical and cotton spinning companies were established in Taegu and Kyongbuk provinces, and many small and medium weaving companies were dependent upon them. The yarn (particularly chemical yarn), produced by the large textile companies has been used as a raw material by local weaving companies. Taegu and the two other cities of Kyongbuk province (Kumi and Kyongsan) have a few large spinning companies employing more than 500 workers (Tab. 6). They became the major center of yarn production in South Korea after the 1970s. The establishment of chemical yarns production companies has strongly influenced the changing structure of the fabric products by many small weaving companies in Taegu. Yun (1997) asserts that the relationships between spinning and

Table 6. The conditions of large spinning companies in Taegu and Kyongbuk provinces

Company name	Numbers of workers	Products	Location
Hanil hamsom	770	Chemical yarn (polyester)	Pukku, Taegu
Tongguk hamsom	1,746	Chemical yarn (polyester)	Kumi, Kyongbuk
Cheil hamsom	3,050	Chemical yarn (polyester)	Kyongsan, Kyongbuk
Kolon	3,050	Chemical yarn (nylon)	Kumi, kyongbuk
Taehan pangjiek	951	Cotton yarn	Pukku, Taegu
Kabul pangjiek	1,051	Cotton yarn	Sogu, Taegu
YOUNGnam pangjiek	688	Cotton yarn	Sogu, Taegu
Yunsong pangjiek	866	Cotton yarn	Kumi, Kyongbuk

source : Institute for the Advancement of Textile Industry, 1995, pp.11-20.

weaving textile companies have been well developed within Taegu and its neighboring cities. 70 percent (125) of the textile companies (180) surveyed bought the raw materials (yarns) produced in Taegu and the neighboring cities (Yun, 1997). All 13 weaving companies studied in my fieldwork used chemical and cotton yarns produced by the large spinning companies such as Tongguk, Cheil, Kolon, Taehan, Sunkyoung, and Kohap. According to the top manager of one weaving company, the locally produced yarns are expensive as compared with those made in foreign countries, but his company benefits from a stable supply. The weaving companies in Taegu acquire the raw materials (yarns) of producing fabrics through various methods (Tab. 7). The chemical and cotton weaving companies of Taegu and Kyongbuk are highly dependent upon intermediaries such as trade company, parent company (mogiop), exporting company, and so on. Only 181 out of the chemical weaving companies (539) surveyed buy directly yarns from domestic spinning companies. Some weaving companies buy yarns through the traditional market, while many cotton weaving companies (47 out of 126 companies) get yarns through their parent company (mogiop).

The selling of the textile products to consumers is the last stage at which local textile capitalists actualize their profits. After the 1970s, the main

consumption market for Taegu's textile products changed from domestic to foreign. Until the early 1970s, the products of Taegu's textile industry were sold in the domestic market more than in foreign ones. In 1973, 50.6 percent of the textile goods produced in Taegu were consumed in domestic markets, and 49.4 percent were exported to foreign countries (Taegu Branch of Bank of Korea, et al., 1974). Table 8 represents the spatial distribution of domestic consumer markets of the textile goods produced in Taegu. From the mid-1950s to the early 1970s, Taegu and Kyongbuk were the major market for the products of textile industry in Taegu, followed by Seoul. After the early 1970s, foreign markets became more important than domestic ones. The proportion of domestic to foreign consumer markets for the local textile products has changed from 70 percent in the 1960s to 30 percent in the 1970s, and it was only 20 percent in the mid-1980s (Taegu City Government and Bank of Taegu, 1984). Also the main export of local textile companies has been fabrics, particularly chemical ones in the 1970s and 1980s. In 1971, only 22.9 percent of the total value of textile exports by the Taegu's textile companies (40.7 million dollars) came from exports of fabrics. But the proportion has increased to 82.9 percent in

Table 7. The buying methods of the domestic cotton and chemical yarns by the weaving companies of Taegu and Kyongbuk in 1993

	Chemical weaving companies	Cotton weaving companies
From business corporation	72	12
From importing company	14	7
From trading company	59	13
From parent company (mogiop)	132	47
Direct buying	181	14
From exporting company	30	13
Through traditional market	51	20
Total	539	126

source : Institute of Development of Taegu and Kyongbuk, 1993, p.50.

Table 8. The structure of consumer market areas of the textile goods produced in Taegu, 1955-1973 (percent)

	Taegu & Kyongbuk	Pusan & Kyongnam	Seoul	Other areas	Export
1955-1961	48.2	5.0	28.6	12.5	5.7
1962-1966	52.6	5.8	22.7	12.7	6.2
1967-1969	53.5	6.1	19.8	12.8	7.8
1972	26.3	4.8	19.5	6.6	42.8
1973	23.4	4.8	16.1	6.2	49.4

* The numbers are the ratio of each area's consuming value of the Taegu's textile goods to the total marketing value of the Taegu's textile companies sampled. The sampled textile companies were 115 in 1955-1961, 177 in 1962-1966, 262 in 1967-1969, 477 in 1972, and 559 in 1973.

source: Kyongbuk Branch of Institute of Productivity in South Korea, 1969 and Taegu Branch of Bank of Korea, et al., 1974.

1980. In 1987, 92.0 percent of the total exporting values of the textile companies in Taegu (1,914 million dollars) came from exports of fabrics, particularly chemical ones (Institute for the Advancement of Textile Industry, 1990). For foreign markets, most of the Taegu's textile companies were highly dependent on subcontracting. Under subcontracting, small textile companies in Taegu are almost totally separated from the consumer market for their products, so they are dependent upon the large companies' production and marketing strategies.

Along with the production and marketing of textile commodities, capital management is a critical element for local textile capitalists to (re)produce their businesses. The (re)production of textile companies in Taegu is dependent upon capitals from outside. Table 9 represents the composition of the capital owned by the textile companies of Taegu. In 1968, the proportion of local textile company's own capital to capital from outside was 43.7, and it declined to 35.3 percent in 1992. The dependence on outside capital was higher in large textile companies than in small and medium ones because larger companies needed much capital both to buy land and machine and to construct buildings. They borrowed capital from banks, the government's financial funds, and sometimes foreign sources.

The small (or medium) textile companies of

Taegu have used various ways of getting outside capital: bank, private loans, borrowing capital from friends and relatives, and credit system (oesang kore). The interest rate on private loans used by the small company is generally higher than that of banks or government funds. The owners of small companies interviewed said that they did not get any support from the government's financial policy:

"Small textile companies do not get benefits from the government's financial policy. They have many problems borrowing money from banks because the banks require the collateral. So small companies get money from private loans or friends. The interest rate of such money is higher (20 percent per year) than that of banks" (my interview, 1995).

Consequently, local small textile companies have to survive under highly competitive market conditions by establishing good social networks with friends, relatives, and neighbors in order to frequently borrow small amounts of money.

In sum, the conditions of (re)production of textile industry in Taegu may be summarized in two aspects. First, in terms of production and marketing organization, a division of labor and hierarchical structure have been established between large and small textile companies particularly since the 1970s. A few large companies produced chemical (or cotton) yarns, and they established international (or domestic) textile marketing systems. Many small companies have produced fabrics based on the yarns locally produced by large companies, and the marketing of their fabrics was highly dependent upon the large companies' marketing systems. They were also dependent upon the large companies for the stab. demands of production. Second, the financial sources of banks and government's funds were beneficial to large and medium textile companies more than many small ones in Taegu. Many small textile companies in Taegu have been dependent upon private loans and money from friends and relatives for the

Table 9. The structure of capital in the textile industry of Taegu, 1968-1992 (million won, percent)

	1968	1973	1992
Total capital	17,744 (100)	30,321 (100)	3,605,917 (100)
Company own capital	7,754 (43.7)	15,486 (51.1)	1,271,177 (35.3)
Capital from Outside (debt)	9,990 (56.3)	14,835 (48.9)	2,334,740 (64.7)

source : Kyongbuk Branch of Institute of Productivity in South Korea, 1969, p.110; Taegu Branch of Bank of South Korea, et al. 1974, p.106; and Institute of Development of Taegu and Kyongbuk, p.147.

operation of their factories.

5. Labor Conditions of Workers in the Textile Industry of Taegu since the 1960s

To understand the (re)production of the textile industry of Taegu after the 1960s, we ought to know the conditions of local textile workers. I focus on local textile labor market, local textile workers' wage, and job segmentation between male and female textile workers.

The development of the textile labor market in Taegu can be divided into two periods: labor surplus in the 1960s and mid-1970s and shortage of unskilled and low paid labor after the late 1970s. Before the mid-1970s, the textile industry of Taegu was not much concerned about the supply of its workers, drawing upon unskilled migrants from the rural areas of Kyongsang provinces. In 1965, for example, the numbers of the Kyongbuk's male and female textile workers graduating middle and primary school were 2,913 (66.1 percent) out of 4,408 and 12,015 (93.6 percent) out of 12,689, respectively (Kyongbuk Branch of Institute of Productivity in South Korea, 1969). The manager in the local textile company well described the situation of Taegu's textile workers in the 1960s and 1970s:

"It was easy to find workers for the textile industry in Taegu because both the level of education and economy and the income of households in South Korea was low until the 1970s. The educational levels of the textile workers in Taegu were generally primary and middle school. Many textile workers in Taegu came from Kyongnam and Kyongbuk provinces" (my interview, December, 1995).

As the South Korean economy became more oriented to heavy and chemical industries rather than light ones after the mid-1970s, it was difficult for the textile industry of Taegu to get a stab. supply of workers. Consequently, both married

female and foreign workers were introduced into Taegu's textile industry after 1980.

Table 10 represents the age and gender structure of the textile workers of Taegu in 1965 and 1993. In 1965, 1,969 out of 2,222 female textile workers (88.6 percent) were under age 30, while the majority of male textile workers was age 31 through 40. In 1993, the ratio of the female workers under age 30 to the total female workers was 55.1 percent (12,348 out of 22,414). Many married female workers were employed in the textile industry of Taegu after 1980. According to my fieldwork, 15 out of 26 female textile workers were married and over age 31. 11 female textile workers did not get married and were age 20 through 30. Nine out of 16 male textile workers were married and over 31. In Taegu, married women dominate the workforce in the small or medium textile companies and there are few female textile workers aged under 20.

The average monthly income of workers in Taegu is one of the lowest among the large cities in South Korea (Tab. 11), and this is closely related to the structure of Taegu's manufacturing industry which has been dependent upon small and medium textile industry since the 1960s. Textile wages are generally low. In 1988, for example, the average income of workers in the South Korean manufacturing industry was 433,933 won, but that

Table 10. Taegu's textile workers by age and gender, 1965 and 1993 (person, percent)

	Male		Female		Total	
	1965	1993	1965	1993	1965	1993
Under 20	85 (6.9)	1,168 (5.4)	656 (29.5)	4,339 (19.4)	741 (21.5)	5,507 (12.5)
21-30	468 (38.1)	8,620 (40.1)	1,313 (59.1)	8,009 (35.7)	1,781 (51.6)	16,629 (37.9)
31-40	566 (46.2)	7,146 (33.3)	217 (9.7)	5,475 (24.4)	783 (22.7)	12,621 (28.7)
over 40	108 (8.8)	4,525 (21.2)	36 (1.7)	4,591 (20.5)	144 (4.2)	9,116 (20.9)
Total	1,227 (100.0)	21,459 (100.0)	2,222 (100.0)	22,414 (100.0)	3,449 (100.0)	43,873 (100.0)

source : Hong, 1969, p.67; Institute of Development of Taegu and Kyongbuk, 1993, p.113.

of textile workers was 314,353 (Institute of Social Movement). Also within the textile industry, there is a gap in worker's wages by gender, education level, job assignment, and skills. In 1988, the beginning wage of the female textile workers who graduated from middle school was 180,611 won per month, but that of the male textile workers having the same education was 196,502 won per month. In the case of the textile workers graduated from high school, females got 192,922 won per month, and male got 207,723 won per month (Institute of Social Movement, 1989). Table 12 represents the wage distribution of the textile workers interviewed. The majority of the female textile workers got 600,000 won through 800,000 won per month, while males got 800,000 won through 1,000,000 won per month. None of the female textile workers got over 1,000,000 won per month, but a few male workers got over 1,000,000 won per month.

The jobs within a textile factory are generally

segmented by gender. Male textile workers are involved in machine maintenance and females in the operation of textile machines and other simple tasks. When I visited a few small weaving factories in Taegu, I could see only a few female weavers and several weaving machines. There were no male workers within the weaving factories. In terms of the learning period in the Taegu's textile industry, 45 (59.2 percent) out of 76 male textile workers took more than one year to learn some skills, while 215 (71.9 percent) out of 299 female textile workers took less than 3 months to learn basic skills (Institute of Social Movement, 1989). According to the textile managers interviewed, female workers in the Taegu's weaving factory need some skills for both the production of goods fabrics and the increase of labor productivity, so since the mid-1980s, small and medium weaving companies have employed many married female weavers who had accumulated skills during the 1960s and 1970s (my interview, 1995).

In sum, wage workers are a necessary condition for industrial capitalists to get profits. The (re)production of locality and its main industries have been related to the conditions and actions of local workers. Until the mid-1970s, the supply of cheap and unskilled workers to the local textile industry was surplus because of the sustained migration of rural people, low levels of education, and limited numbers of job opportunities. After the 1980s, however, the conditions of the local labor market changed from surplus to shortage mainly because of the gradually increasing education levels, incomes, and job opportunities. Local textile manufacturers therefore have developed various strategies, including the establishment of special school systems (Sanopch'e t' ukpyolhakkup and pusolhakkyo), the introduction of married female and foreign workers, and the installment of high speed automatic machines. The jobs and wages of the local textile industry have been differentiated by gender, education, and skill. The wage of local

Table 11. Average monthly incomes of workers in South Korea and its four main cities, 1985 - 1990 (won)

	1985	1988	1990
S. Korea	314,213	446,800	616,765
Seoul	365,462	505,261	695,029
Pusan	257,569	365,805	528,575
Taegu	285,136	386,423	532,105
Inch'on	289,099	450,856	615,896

source :Chu, 1993, p.32.

Table 12. Distribution of the wages of the textile workers in Taegu by age and gender (1,000 won)

	Wage	Under 20	21-30	31-40	Over 40
Male	400-600	1			
	610-800	2	1		
	810-1,000		1	5	3
	over 1,000				3
Female	400-600	2			1
	610-800	1	10	3	10
	810-1,000			1	
	over 1,000				

source : interview data, 1995.

textile workers was low as compared with that of other manufacturing workers, and it was one of the main reasons that the textile industry has been (re)produced in Taegu during the last four decades.

6. Conclusion

There are several features in the mode of economic development of South Korea. First, the government controlled the financial systems and capital-labor relations. After the early 1980s, however, the financial system was gradually liberalized due to the pressure of internal (chaebols) and external (developed countries) forces. Also the government's labor policy changed from strong repression to adjustment after 1987. Second, the mass production system of standard goods was (re)produced through the promotion of exports. Third, a few large companies (chaebols) were dominant compared to many small (or medium sized) companies in terms of production and marketing system, and they were supported by the government's various policies.

Until the early 1970s, the textile industry of South Korea was (re)produced by a cheap and unskilled workforce and the labor intensive industrial policy of the government. After the mid-1970s, however, it had to adapt to the changing conditions of the economy, the labor market, and the government's industrial policy. Since then, the textile industry of South Korea has become dependent upon chemical textiles and further mechanized, and it also used various strategies to solve the increase of wages, shortage of labor, and labor strikes.

Local agents-the city government, local capitalists, and local workers- played an active role in (re)producing the local textile industry, although their actions were constrained by national economy and politics as well as the international political economy. According to my findings, local agents have established local institutions or organizations

for the (re)production of the textile industry, and also they have been constrained by the changing conditions of national economy and politics.

References

- Amsden, A.H., 1989, *Asia's Next Giant: South Korea and Late Industrialization*, London, Oxford University Press.
- Cho, M.R., 1991, *Political Economy of Regional Differentiation*, Seoul, Hanul.
- Cho, U.S., 1993, *The development of the South Korean capitalism and the change of regional structure*, Pusan National University, Ph.D. dissertation.
- Chu, M.H., 1993, Characteristics on the income structure of Taegu, *Taegu-Kyongbuk chiyok tonghyang*, 7, 30-38.
- Department of Commerce and Federation of Textile Industry of South Korea, 1989, *The 7-year Plan of the Improvement of Structure of Textile Industry*, Seoul, Department of Commerce and Federation of Textile Industry of South Korea.
- Hong, K.H., 1966, *The Geographical Study of Taegu City*, Taegu, Taegu City Government.
- Im, C.C. and Lee, C.P., 1993, The growth and structural change of the South Korean chemical textile industry, in Im, C.C. and Lee, C.P.(eds.), *The Chemical Textile Industry of South Korea*, Seoul, Association of Korean Chemical Textile Industry, 443-552.
- Institute for the Advancement of Textile Industry, 1990, *History of the Textile Industry of Taegu*, Taegu, Institute for the Advancement of Textile Industry.
- Institute for the Advancement of Textile Industry(IATI), 1995, The evaluation result of statistical data toward the facilities of Taegu's textile industry, in IATI, *The Outline of the Textile Industry of Taegu and*

- Kyongbuk, Taegu, IATI.
- Institute of Development of Taegu and Kyongbuk, 1993, *Five Year Plan for the Development of the Taegu's Textile Industry*, Taegu, Taegu city government.
- Institute of National Territory Development, 1996, *National Territory; 50 Years*, Seoul Press, Seoul .
- Institute of Social Movement, 1989, *Conditions and Situations of Labor Movement in the Textile Industry of Taegu, I and II*, Taegu, Institute of Social Movement.
- Kim, D.H., 1992, *Economic Development and the Change of Spatial Structure in South Korea*, Seoul National University, Ph.D. dissertation.
- Kim, E.M., 1993, Contradiction and limits of a developmental state: with illustrations from the South Korean case, *Social Problems*, 40, 228-249.
- Kim, J.H., 1994, Restructuring of the textile and garment industry in Korea, in the World Bank, *Korea; Managing the Industrial Transition*, Washington, D.C., the World Bank, 175-203.
- Kim, W.B., 1992, *The Capital Accumulation of South Korea and the Structuration of Region*, Yonsei University, Ph.D. dissertation.
- Korean Federation of Textile Industry, various years, *Textile Yearbook*, Seoul, Korean Federation of Textile Industry.
- Kyongbuk Branch of Institute of Productivity of South Korea, 1969, *Investigation and Report of Textile Industry in Kyongbuk, Taegu*, Kyongbuk Province Government.
- Lee, C. et al., 1988, *Korea: Geographical Perspectives*, Seoul, Korean Educational Development Institute.
- Park, K.T., 1997, *The Development of the Textile Industry in Taegu, South Korea*, University of Hawaii at Manoa, Ph.D. dissertation.
- Song, B.N., 1990, *The Rise of the Korean Economy*, Oxford University Press, New York.
- Taegu Branch of Bank of Korea, et al., 1974, *The Situations on the Textile Industry of Taegu*, Taegu Branch of Bank of Korea .
- Taegu City Government, various years, *Yearbook of Education in Taegu*, Taegu, Taegu City Government.
- Taegu City Government and Bank of Taegu, 1984, *Direction of Development of the Textile Industry in Taegu, Economic Analysis of Taegu*, 13, 42-64.
- White, G. et al., 1988, *Developmental States in East Asia*, Macmillan Press, London.
- Yun, I.N., 1997, *Spatial Linkages of Taegu Textile Industry*, Kyongbuk National University, Ph.D. dissertation.