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## ***IMPORT PROBLEMS AND PUBLIC POLICIES: THE U.S. TEXTILE INDUSTRY***

### **I. INTRODUCTION**

Increasingly, foreign products are displacing domestically produced goods in the American marketplace. In recent years, imports have captured a larger and larger share of the markets for such products as textiles, automobiles, steel, and televisions; in many cases, American firms seem to be rapidly losing their ability to compete against foreign enterprise. Not so long ago, American industry was the envy of the world -- the ingenuity, "know-how," and efficiency of U.S. managers and their methods, coupled with a commitment to research and development and a skilled workforce had produced an economic engine that few nations could even hope to emulate. Now, however, many sectors of the nation's economy are on the defensive as they systematically lose ground to lower priced goods produced by foreign manufacturers.

Since the time of Adam Smith more than two centuries ago, economists have generally advocated free trade among nations. Free trade, at least in theory, works to the advantage of both producers and consumers in all nations because goods are produced and sold at their lowest prices. Nations can exploit their "comparative advantage" and employ their resources in the most efficient production processes. For example, current technology could undoubtedly make it feasible to grow domestically all of the bananas consumed in the U.S., but it would be prohibitively costly -- consumers would have to pay much more for domestic bananas grown in an artificially created climate. It is cheaper to import bananas from countries where the climate is ideal for the cultivation of this fruit. Banana-producing countries, in turn, import some goods from the U.S. Such trading patterns for many agricultural commodities and manufactured goods have long existed. In the U.S., few (if any) resources have ever been devoted to the commercial production of bananas, but vast domestic resources have historically been devoted to the production of

textiles, autos, steel, and other goods that are now being displaced by foreign manufacturers.

When an established industry is threatened by imports, serious economic difficulties can result. At best, the growth and expansion of U.S. industry is retarded; at worst, tens of thousands of American jobs can be lost not only in the affected industry, but also in other economic sectors that supply inputs or use the outputs of the affected industry. Both white and blue-collar jobs are lost when plants close because products are being manufactured overseas. In the long run, the economic base of the nation may deteriorate as basic industries that, in wartime, play an important strategic role (steel, automobiles, and textiles) lose productive capacity. To ease the economic dislocations created by imports and to provide time for an adjustment to changing economic conditions, constraints are often imposed on the volume of imports. These constraints may be "voluntary," e.g., the import quotas negotiated with regard to automobile imports between the U.S. and Japan, or binding, e.g., the Multi-fiber Arrangement that limits the importation of textiles into the U.S. and other developed countries. Without such constraints, it is clear that the volume of imports would be much greater as would the adverse economic effects that accompany the increasing foreign penetration of domestic markets. Theoretically, there are positive economic gains associated with free trade. But free trade also involves the possibility of real economic losses and adjustment costs in the short run as well as long-term problems that could be associated with the decline in domestic capability to produce if foreign firms became unreliable sources of supply, e.g., in the event of war.

This study addresses two important questions related to the issue of the decline of U.S. industry as a result of increasing foreign imports: Why have American firms been losing their ability to compete with foreign firms? What are the policy alternatives? The analysis focuses on the textile industry, but the general findings are applicable to a number of industries threatened by imports from abroad.

## II. THE ECONOMIC SIGNIFICANCE OF THE U.S. TEXTILE INDUSTRY

Every individual is dependent upon the textile industry, because some of its principal end products are among the three essentials for human survival: food, clothing, and shelter. Thus, throughout history, all civilizations have developed, in one form or another, a means of fulfilling the functions of the modern textile industry. Textile products are used by consumers for a wide variety of purposes in the home and in recreation; other consumer uses, such as cord for automobile tires, are less apparent. The industrial and military demands for the industry's output are equally wide ranging, because textiles are used for such items as conveyor belts, hoses, and environmental pollution control equipment. The average American now consumes almost 60 pounds of products from the textile industry each year, more than twice the per capita rate of consumption in other developed nations and several multiples of the per capita usage in less developed nations of the world. In thus clothing the nation's citizens, providing a wide array of products to maintain a high standard of living, and contributing to the industrial and defense needs of the nation, the role of the textile industry is critical to the nation's well-being. It is also important to note the recent, rapid growth of the consumption of textiles -- in the two decades between 1960 and 1979, per capita consumption rose by about 55 percent. Most of this increase occurred during the 1960s. Thus, improved living standards have resulted in a growing dependency on textile products.

Because the products of the textile industry are of such critical importance, the industry plays a major role in the nation's economy. One indicator of the size and significance of the textile complex is the level of employment or the number of jobs which depend upon its output. Table II-1 shows that about two and two-thirds million workers earn incomes from the production of textiles, apparel, and textile machinery. The manufacture of apparel (1.3 million workers) and textile mill products (884 thousand workers) account for more than 82 percent of the total, while the fiber component employs 16 percent and textile machinery only one percent of all textile workers. Textile mill products and apparel producers are considered manufacturing firms by the U.S. Department of Commerce. In 1979, the 2.2 million workers in these two segments of the textile industry accounted for 10.5 percent of all manufacturing jobs in the U.S. economy -- one of every nine workers in American manufacturing. Obviously, the industry is large not only in absolute terms, but also in relative terms.

A widely accepted notion that the textile industry is located almost exclusively in the industrial northeast and the south might suggest that any economic dislocations resulting from a decline in the industry or any economic benefits attributable to expansion would be confined to these two regions of the country. The data in Table II-1, however, clearly reveal that the industry is more widely dispersed geographically. It is true that almost

two-thirds of total industry employment is located in nine states (Alabama, California, Georgia, New York, North Carolina, Pennsylvania, South Carolina, Tennessee, and Texas), and all but one of these states (California) is in the northeastern or southern regions of the U.S. But fiber, either man-made or natural, is produced in forty-five states, apparel is made in forty-four states, and textile mill products are manufactured in thirty-six states. There is also considerable diversity in the employment locations of particular segments of the industry. For example, whereas North Carolina, South Carolina, and Georgia are the three states with the greatest numbers of employees in the textile mill products category, New York, Pennsylvania, and California are the three states with the greatest number of workers in the apparel category. The regional economic impact of changes in the industry's fortunes would then depend to some degree on the particular industry segment in which the changes occurred.

A broader, and more appropriate, perspective on the absolute and relative size of the textile complex and its geographical distribution can be gained by recognizing that this industry does not exist in isolation, but is closely tied to other segments of the economy. For economic purposes, the "boundaries" of this or any other industry are rather difficult to define, even though the basic processes of the textile industry itself are relatively straightforward: Put simply, fiber (man-made or natural) is made into yarn which, in turn, is woven into the fabrics for apparel and other products for consumer, government, and industrial use. This manufacturing chain represents only the "primary" segment of the industry. Each of these primary producers, however, buys a whole range of products and services from other firms, e.g., cotton from cotton farmers. Cotton farmers must purchase seeds, pesticides, fertilizers, and machinery in order to produce cotton so that all these other sectors of the economy, at least in part, also depend upon the textile industry. Thus, an accurate assessment of the economic significance of the textile complex must take into account the firms and workers in these other sectors -- the "secondary" output and employment produced by the textile industry.

Estimates of the employment and output generated in other sectors of the economy by activity in the fiber/textile/apparel complex can be obtained from "input-output" tables developed by the U.S. government. These tables contain information on the economic links between the various sectors of the economy and can be used to determine the output generated in one sector by the output produced in another. Distinctions have been drawn between commodity or raw material inputs and capital goods such as machinery and equipment. The total employment and output generated in sectors outside the fiber/textile/apparel complex, therefore, consists of the sum of the employment and output generated in the production of both commodity inputs and capital goods. The detailed estimates are presented in Appendix Tables II-A, II-B, II-C, and II-D.

Table II-1  
 Employment in the Textile Industry by Industry Segment<sup>1</sup>  
 and by State, 1977-1980

State	Fiber Production				Textile Machinery	Total Employment
	Textile Mill Products	Apparel	Man-made	Cotton		
Alabama	44,200	52,800		7,358		104,358
Alaska					20	20
Arizona		5,700		16,545	400	22,645
Arkansas	4,400	13,900		15,614		33,914
California	16,000	111,900		44,776	5,400	178,076
Colorado		3,900			2,600	6,500
Connecticut	9,200	11,500			310	21,310
Delaware	700	1,400				2,100
Florida	4,800	34,700				39,500
Georgia	122,900	74,700		3,159	1,300	202,059
Hawaii		3,300				3,300
Idaho					2,000	2,000
Illinois	2,800	22,500			6,800	D <sup>2</sup> 32,100
Indiana	800	12,500			4,400	17,700
Iowa	1,200	4,200			11,500	16,900
Kansas		3,700			2,200	5,900
Kentucky	6,800	27,200			700	D <sup>2</sup> 34,700
Louisiana	2,500	10,900		9,533	700	23,633
Maine	8,900	4,400			590	13,890
Maryland	1,000	16,300			770	18,070
Massachusetts	27,200	41,100			480	3,200 71,980
Michigan	2,500	25,400			2,700	30,600
Minnesota	2,500	5,800			7,900	16,200

Table II-1 (continued)

State	Fiber Production					Textile Machinery	Total Employment
	Textile Mill Products	Apparel	Man-made	Cotton	Wool		
Mississippi	6,300	40,600		28,115			75,015
Missouri	600	29,900		4,540	3,000		38,040
Montana					2,200		2,200
Nebraska		2,300			3,000		5,300
Nevada					300		300
New Hampshire	5,300	2,800			410	500	9,010
New Jersey	21,700	57,300			700	700	80,400
New Mexico		3,800		4,021	1,400		9,221
New York	37,300	180,900			2,200	1,300	221,700
North Carolina	255,900	88,800	15,800	1,890	400	5,800	368,590
North Dakota					1,900		1,900
Ohio	5,900	18,700			8,000	D <sup>2</sup>	32,600
Oklahoma	1,900	11,700		8,018	2,100		23,718
Oregon	2,100	3,600			4,800		10,500
Pennsylvania	48,400	128,800			4,700	1,400	183,300
Rhode Island	12,500	3,600				1,500	17,600
South Carolina	142,400	47,800	18,400	2,688		D <sup>2</sup>	211,288
South Dakota		1,100			5,600		6,700
Tennessee	27,200	69,300			450	800	104,505
Texas	6,000	75,000		76,303	9,000		166,303
Utah		7,000			2,400		9,400
Vermont	600	1,700			500		2,800
Virginia	44,600	34,700	14,800		2,800		96,900
Washington	1,000	7,200			2,000		10,200

Table II-1 (continued)

State	Textile Mill Products	Fiber Production				Textile Machinery	Total Employment
		Apparel	Man-made	Cotton	Wool		
West Virginia	700	5,200			3,400		9,300
Wisconsin	5,300	6,500			3,600		15,400
Wyoming					1,200		1,200
Not Reported							
by State			40,900	158	6,000	9,100	56,158
Total	844,100	1,316,100	89,900	229,473	121,530	25,900	2,667,003

<sup>1</sup>Data above are based on latest available statistics for years 1977 through 1980.

<sup>2</sup>Data withheld to avoid disclosing figures for individual companies.

Source: American Textile Manufacturers Institute

In Table II-2, the total employment generated in other sectors of the economy by the output in 1980 from the fiber/textile/apparel industry is given by major industrial sector disaggregated by selected components of the textile complex that were required to support the output of fiber, textile products, and apparel. The manufacturing and services sectors were the primary beneficiaries in terms of employment, accounting for about 55 percent of the total employment generated. The apparel component of the textile industry requires the greatest amount of employment in other sectors of the economy: 490.6 of the 925.5 thousand jobs created or 53 percent.

Appendix Table II-B summarizes the value of output in 1980 generated in industrial sectors other than in the textile complex by the 1980 output of textiles and related products. The total output of the fiber/textile/apparel groups listed in the table was approximately \$102.3 billion and, of this, apparel alone accounted for \$60.8 billion or 59 percent. The output requirements of industrial sectors other than textiles in 1980 that are attributable to textile output amounted to \$43.5 billion, of which apparel production was responsible for \$22 billion, or 50.6 percent. Along with the fact that the apparel segment is responsible for nearly half of the employment in the fiber/textile/apparel industry itself (see Table II-1), this clearly indicates that the apparel component of the industry is the most important in terms of economic significance as measured by both primary and secondary output and employment.

Table II-2  
 Total Employment Requirements Generated by 1980 Output of Fiber/Textile/Apparel  
 Products from Industries Outside of Fiber/Textile/Apparel  
 Industrial Complex, by Sector for Those Industrial Sectors  
 Outside the Fiber/Textile/Apparel Industrial Complex  
 (number of jobs)

	Fabric, Yarn Floor and Thread Covering Mills		Textile Mill Products n.e.c.		Hosiery & Knit Goods		Apparel		Fabricated Textile Products, Synthetic n.e.c.		Total
	Mills	Mills	Products n.e.c.	Mill Products n.e.c.	Goods	Apparel	n.e.c.	Fibers			
Agriculture, Forestry And Fisheries	16,048	11,875	4,323	5,081	47,097	14,726	30	99,180			
Mining	1,892	2,451	1,541	1,145	8,202	2,509	117	17,857			
Maintenance & Repair Construction	1,546	2,123	1,224	969	7,843	2,281	67	16,053			
Manufacturing, other than the industries of the Fiber/Textile/Apparel Industrial Complex	19,371	35,472	23,516	15,070	129,748	39,807	951	263,935			
Transportation	5,921	9,727	5,763	4,249	38,907	11,933	185	76,685			
Wholesale and Retail Trade	10,175	17,834	7,487	7,579	82,454	19,515	188	145,232			
Services	16,851	25,606	13,688	12,152	142,423	33,294	491	244,505			
Others	4,544	8,271	3,802	3,354	33,937	8,013	151	62,072			
Total	76,347	113,359	61,345	49,599	490,613	132,077	2,180	925,520			

n.e.c. = not elsewhere classified.

Totals may not agree due to independent rounding.

Source: Economic Consulting Services, Inc., "The Dependency of the United States Economy on the Fiber/Textile/Apparel Complex" (Washington, D.C., 1981), Table 4. These estimates were derived from U.S. Department of Labor, Bureau of Labor Statistics, Time-series data for input-output industries -- output, price, and employment, unpublished; U.S. Department of Labor, Bureau of Labor Statistics, 1979 Employment Requirements Table, unpublished; U.S. Department of Commerce, Bureau of Economic Analysis, The Detailed Input-Output Structure of the U.S. Economy: 1972, Volume I, 1979.

It is shown in Appendix Table II-C that fibers, textile products, and apparel acquired in excess of \$2 billion of new capital goods in 1972 and that the production of these capital goods sustained more than 111 thousand jobs in a variety of industries. The industries that depended upon the fiber/textile/apparel complex also required capital goods for their production. As reported in Table II-3, the production of capital for industries dependent upon the textile complex generated an additional 16.9 thousand jobs in 1972. Table II-3 also indicates that the total secondary employment associated with fiber, textile, and apparel production in 1972 was approximately one million jobs. Thus, when the linkage between the textile complex and other sectors of the economy is taken into account, it is apparent that the economic dimensions of the textile industry are much broader than is indicated by employment and output data for fiber, textile products, and apparel alone, because at least one million additional jobs in other sectors depend upon the output of the textile complex, bringing the total to at least 3.6 million jobs generated by the textile industry. The dominant apparel component supported at least 1.8 million of these primary and secondary jobs throughout the economy. The conclusion to be drawn from such analysis is straightforward: economic growth or decline of the domestic producers in the fiber/textile/apparel complex, especially in the apparel segment, will affect employment and output throughout the economy.

One further point regarding employment in the textile industry should be emphasized: the industry provides tens of thousands of jobs for individuals with few skills and limited alternative employment opportunities. According to the U.S. Department of Labor, 78 percent of apparel workers and 67 percent of textile workers are only semiskilled. By comparison, only 44 percent of jobs in the entire manufacturing sector are available to semi-skilled workers. The complex also employs large proportions of female and minority workers. In apparel, 81 percent of the production workers are female; in textiles the comparable figure is about 47 percent, while less than a third of the manufacturing jobs throughout the economy as a whole are held by women. Minority employment in the industry is also very high; fully 28 percent of textile workers are members of minority groups, compared to 18 percent in the entire manufacturing sector. The educational level of textile workers is also relatively low, for more than one-quarter of the production workers have eight years of education or less.

The location of production facilities in the rural southeast and in urban centers in the northeast can be attributed in part to the size of the labor supply required by the industry. Alternative employment opportunities for low-skilled workers, particularly in urban areas, are very limited, especially for minorities and females. The unemployment rate among urban minority teenagers, for example, has approached or even exceeded 50 percent in recent years. In rural areas, many female workers are second income earners in the family who would find it difficult to migrate

Table II-3  
 Total Employment Requirements Generated by Output of Fiber/Textile/Apparel  
 Products Outside of the Fiber/Textile/Apparel Complex and Employment  
 Requirements Related to Capital Goods Used by the Fiber/Textile/  
 Apparel Industrial Complex, 1972

	<u>Fiber/Textile/Apparel Industrial Complex</u>
Employment Required Outside The Fiber/Textile/Apparel Industrial Complex By Demand for Products	888,535
Employment Required For New Capital Goods Used By The Fiber/Textile/ Apparel Industrial Complex	111,097
Employment Required For New Capital Goods Used By The Industries Most Dependent On the Fiber/Textile/ Apparel Industrial Complex <sup>1</sup>	<u>16,872</u>
Total Employment Required in 1972	1,016,504

<sup>1</sup>For those new Capital Goods which the total value of use attributable to supplying the Fiber/Textile Apparel Industrial Complex was \$10 million or more.

Source: Economic Consulting Services, Inc., "The Dependency of the United States Economy on the Fiber/Textile/Apparel Industrial Complex," (Washington, D.C., 1981), Table 7. These estimates were derived from U.S. Department of Labor, Bureau of Labor Statistics, Time-series data for input-output industries -- output, price, and employment, unpublished; U.S. Department of Labor, Bureau of Labor Statistics, 1972 Employment Requirement Table, unpublished; U.S. Department of Commerce, Bureau of Economic Analysis, The Detailed Input-Output Structure of the U.S. Economy: 1972, Volume I, 1979; U.S. Department of Commerce, Bureau of Economic Analysis, New Structures and Equipment by Using Industries, 1972: Detailed Estimates and Methodology, September 1980.

elsewhere to seek alternative employment. Because of these characteristics of its workforce, a growing textile industry offers job opportunities to workers who would have difficulty obtaining employment in other industries; and if the number of textile jobs were reduced, the workers thus displaced would have few alternatives in finding work. Thus, the fiber/textile/apparel complex is of great economic significance not only because of the total number of jobs it creates, but because of the employment it offers tens of thousands of low-skilled workers, in particular minorities and females.

Appendix Table II-A  
 Total Employment Requirements in All Industries Generated by 1980 Output<sup>1</sup>  
 of Fiber/Textile/Apparel Products from Industries Outside of the  
 Fiber/Textile/Apparel Industrial Complex by Industry

<u>Fiber/Textile/Apparel Products:</u>						
	<u>Fabric, Yarn &amp; Thread Mills</u>		<u>Floor Covering Mills</u>		<u>Textile Mill Products n.e.c.</u>	
					<u>Hosiery &amp; Knit Goods</u>	<u>Apparel</u>
						<u>Fabricated Textile Products n.e.c.</u>
						<u>Synthetic Fibers</u>
						<u>Total</u>
4,807	6,063	3,095	2,635	32,298	7,761	56,775

1980 Total Demand for  
 Fiber/Textile/Apparel  
 Products, By Product  
 (million dollars)<sup>2</sup>

Industries in Which  
 Employment was Required  
 by Intermediate Demand

Number of Jobs

Industries Outside the  
 Fiber/Textile/Apparel  
 Industrial Complex

Meat Animals & Livestock	530	559	1,061	180	3,011	1,062	3	6,406
Cotton	11,079	7,777	1,582	3,288	27,556	9,066	7	60,355
Agricultural, Forestry & Fishery Services	3,494	2,553	690	1,178	9,726	3,042	7	20,690
Coal Mining	663	794	502	394	2,795	892	43	6,083
Maintenance & Repair Construction	1,545	2,123	1,224	969	7,843	2,281	67	16,052
Paper Products	1,296	1,989	2,177	1,676	9,618	3,823	89	20,668
Paperboard	924	1,394	972	1,418	8,094	2,146	32	14,980

Appendix Table II-A (continued)

## Fiber/Textile/Apparel Products:

	Fabric, Yarn & Thread Mills	Floor Covering Mills	Textile Mill Products n.e.c.	Hosiery & Knit Goods	Apparel	Fabricated Textile Products		Total
						n.e.c.	Synthetic Fibers	
Printing & Publishing, n.e.c.	679	1,810	1,101	742	6,611	1,867	25	12,835
Industrial Inorganic & Organic Chemicals	4,310	5,533	3,846	2,532	14,954	4,777	374	36,326
Plastic Materials & Synthetic Rubber	506	1,597	1,120	322	2,166	957	46	6,714
Rubber Products, except Tires & Tubes	744	6,957	1,860	662	6,162	1,497	11	17,893
Plastic Products	1,003	1,892	2,220	1,024	6,080	4,173	57	16,449
Manufactured Products, n.e.c.	191	464	341	390	19,689	1,607	7	22,689
Railroad Transportation	1,370	1,946	1,321	868	6,133	2,081	61	13,780
Local Transit & Intercity Buses	437	779	686	458	4,554	1,127	9	8,050
Truck Transportation	3,008	5,208	2,431	2,177	20,237	6,641	78	39,780
Wholesale Trade	9,621	17,017	7,086	7,223	78,476	18,596	170	138,189
Eating & Drinking Places	2,590	3,997	1,941	1,690	21,329	4,577	85	36,209
Banking	1,102	1,638	839	813	10,614	2,201	35	17,242
Real Estate	1,497	2,106	1,200	962	9,762	2,761	38	18,326
Hotels & Lodging Places	1,430	2,005	1,835	1,360	16,561	4,263	35	27,489

Appendix Table II-A (continued)

Fiber/Textile/Apparel Products:

	Fabric, Yarn & Thread Mills	Floor Covering Mills	Textile Mill Products n.e.c.		Hosiery & Knit Goods	Apparel	Fabricated Textile Products n.e.c.		Total
			Mill Products n.e.c.	n.e.c.			n.e.c.	Fibers	
Personal & Repair Services	657	1,093	1,389	527	527	6,563	1,939	17	12,185
Business Services, n.e.c.	4,799	7,368	2,959	3,156	3,156	38,812	7,491	133	64,718
Professional Services, n.e.c.	1,986	2,009	1,064	930	930	10,536	2,463	55	19,043
Other <sup>3</sup>	<u>20,887</u>	<u>32,752</u>	<u>19,897</u>	<u>14,661</u>	<u>14,661</u>	<u>142,731</u>	<u>40,747</u>	<u>697</u>	<u>272,372</u>
Total Outside Industrial Complex	76,348	113,360	61,344	49,600	49,600	490,613	132,077	2,181	925,523

<sup>1</sup>Total Employment Requirements are the employment required directly and indirectly in the industries named at the beginning of the row in order to deliver to final demand and intermediate use outside of the Industrial Complex the 1980 dollar volume of output of the commodities named at the head of each column. Final demand includes personal consumption expenditures, gross private domestic fixed investment, net trade, and Federal, State and local government purchases. Intermediate demand outside of the industrial complex includes the use of the complex's products by industries outside the complex for purposes other than for final demand of the product.

<sup>2</sup>1980 Demand in producer's prices. Amounts do not include distribution costs (trade margins or freight costs).

<sup>3</sup>Includes industries for which less than 1 job per \$2 million of demand in 1972 dollars was required.

Source: Economic Consulting Services, Inc., "The Dependency of the United States Economy on the Fiber/Textile/Apparel Industrial Complex" (Washington, D.C., 1981), Table 3. The estimates were derived from U.S. Department of Labor, Bureau of Labor Statistics, BLS 1979 Employment Requirements Table, unpublished; U.S. Department of Labor, Bureau of Labor Statistics, Time-series data for input-output industries -- output, price, and employment, unpublished; U.S. Department of Commerce, Bureau of Economic Analysis, The Detailed Input-Output Structure of the U.S. Economy: 1972, Volume I, 1979.

Appendix Table II-B  
 Total Output Requirements<sup>1</sup> from All Industries Generated by 1980 Output of  
 Fiber/Textile/Apparel Products from Industries  
 Outside of the Fiber/Textile/Apparel Industrial Complex, by Industry  
 (millions of dollars)

	Fabric, Yarn & Thread Mills	Floor Covering Mills	Textile		Hosiery & Knit Goods	Apparel	Fabricated Textile Products		Total Output Requirements Generated by Demand for Fiber/Textile/ Apparel Products
			Mill Products n.e.c.	Mill Products n.e.c.			n.e.c.	Synthetic Fibers	
Meat Animals & Livestock	\$62	\$55	\$108	\$15	\$294	\$111	neg.	\$645	
Cotton	396	230	49	85	824	289	neg.	1,873	
Agricultural, Forestry & Fishery Services	69	42	12	17	158	54	neg.	352	
Coal Mining	33	32	22	14	116	39	\$2	258	
Maintenance & Repair Construction	96	109	66	43	404	125	3	846	
Paper Products	118	149	172	110	727	309	6	1,591	
Paperboard	79	98	72	87	575	162	2	1,075	
Printing & Publishing, n.e.c.	30	67	42	24	242	74	1	480	
Industrial Inorganic & Organic Chemicals	511	540	395	216	1,470	501	34	3,667	
Plastic Materials & Synthetic Rubber	72	186	137	33	255	120	5	808	
Rubber Products, except Tires & Tubes	24	184	52	15	165	43	neg.	483	
Plastic Products	64	100	124	47	326	237	3	901	

Appendix Table II-B (continued)

	Fabric, Yarn & Thread Mills	Floor Covering Mills	Textile		Hosiery & Knit Goods	Apparel	Fabricated		Total Output Requirements Generated by Demand for Fiber/Textile/ Apparel Products
			Mill Products n.e.c.	Mill Products n.e.c.			Textile Products n.e.c.	Synthetic Fibers	
Manufactured Products, n.e.c.	9	17	13	13	13	740	64	neg.	856
Railroad Transportation	76	89	63	35	35	281	102	3	649
Local Transit & Intercity Buses	15	22	20	11	11	129	35	neg.	232
Truck Transportation	121	172	84	63	63	675	237	2	1,354
Eating & Drinking Places	54	68	35	25	25	368	84	1	635
Banking	45	55	30	24	24	362	80	1	597
Real Estate	251	291	175	116	116	1,360	411	5	2,609
Hotels & Lodging Places	17	20	19	12	12	165	45	neg.	278
Personal & Repair Services	16	22	30	9	9	136	43	neg.	256
Business Services, n.e.c.	163	207	87	77	77	1,098	226	3	1,861
Professional Services, n.e.c.	58	70	39	28	28	371	92	2	660
Other <sup>2</sup>	2,031	1,955	1,510	969	969	10,794	3,226	49	20,534
Total Requirements Outside the Industrial Complex	\$4,410	\$4,780	\$3,356	\$2,088	\$2,088	\$22,035	\$6,709	\$122	\$43,500
<u>Industries Within the Fiber/Textile/Apparel Industrial Complex</u>	\$7,874	\$11,318	\$4,371	\$4,676	\$4,676	\$60,765	\$13,148	\$121	\$102,273

Appendix Table II-B (continued)

n.e.c. = not elsewhere classified.

neg. = negligible. Total requirements were less than \$1 million.

<sup>1</sup>Producers' Prices. Excludes distribution costs (trade margins and freight costs). Each entry represents the output required, directly and indirectly, from the industry named at the beginning of the row for the 1980 dollar value of delivery to Final and Intermediate Demand of the commodity named at the head of the column.

<sup>2</sup>Includes those industries included in the "Other" row of Tables 1, 2 and 3.

Source: Economic Consulting Services, Inc., "The Dependency of the United States Economy on the Fiber/Textile/Apparel Industrial Complex" (Washington, D.C., 1981), Table 8. These estimates were derived from U.S. Department of Labor, Bureau of Labor Statistics, Time-series data for input-output industries -- output, price, and employment, unpublished; U.S. Department of Labor, Bureau of Labor Statistics, Values for Total Requirements 1972, unpublished; U.S. Department of Commerce, Bureau of Economic Analysis, The Detailed Input-Output Structure of the U.S. Economy: 1972, Volume I, 1979.

Appendix Table II-C  
 Employment Requirements Generated by the Use of Selected<sup>1</sup>  
 New Capital Goods by the Fiber/Textile/Apparel Complex, 1972

Industry	Value of Capital Used (\$ millions)	Employment Requirements
Furniture & Fixtures, except Household	\$ 33.9	2,571
Fabricated Structural Metal Products	25.1	1,718
Fabricated Metal Products, n.e.c.	21.7	1,368
Material Handling Equipment	57.2	3,640
Special Industry Machinery	950.8	56,650
General Industry Machinery	56.1	3,492
Computer & Peripherals	55.0	3,836
Typewriters & Other Office Equipment	13.1	850
Service Industry Machines	20.5	1,127
Electric Transmission Equipment	22.5	1,553
Electrical Industrial Apparatus	31.2	2,128
Household Appliances	74.4	4,688
Motor Vehicles	114.0	6,067
Scientific & Controlling Instruments	21.8	1,639
Photographic Equipment & Supplies	21.3	962
Wholesale Trade	77.9	4,494
Retail Trade	18.8	1,935
New Construction	410.3	12,379
<b>Total for Fiber/Textile/Apparel</b>	<b>\$2,025.6</b>	<b>111,097</b>

<sup>1</sup>Includes only those new commodities for which the Industrial Complex's use was valued at \$10 million or above in 1972. The value contributed by the Synthetic Fiber industry was estimated by assuming that the Synthetic Fiber industry's use of capital goods correlated with its share of the Total Commodity Output for the Plastics and Synthetic Materials Sector. Capital Goods are valued at the site of production (producer's value) and exclude transportation and handling charges.

## Appendix Table II-C (continued)

Source: Economic Consulting Services, Inc., "The Dependency of the United States Economy on the Fiber/Textile/Apparel Industrial Complex" (Washington, D.C., 1981), Table 6. These estimates were derived from U.S. Department of Commerce, Bureau of Economic Analysis, New Structures and Equipment by Using Industries, 1972: Detailed Estimates and Methodology, September 1980; U.S. Department of Labor, Bureau of Labor Statistics, 1972 Employment Requirements Table, unpublished; U.S. Department of Labor, Bureau of Labor Statistics, Time-series data for input-output industries -- output, price, and employment, unpublished.

## Appendix Table II-D

Value of New Capital Goods Used by the Fiber/Textile/Apparel Industrial Complex, Actual for 1972 and Estimated for 1980 in Current 1980 Dollars and Constant 1972 Dollars

	<u>1972</u> (\$ million)	<u>1980E<sup>1</sup></u> (\$ million)	<u>1980E<sup>2</sup></u> (1972 \$ million)
Furniture & Fixtures	33.9	59.1	30.1
Fabricated Structural Metal Products	25.1	43.8	19.9
Fabricated Metal Products n.e.c.	21.7	37.8	18.3
Material Handling Equipment	57.2	99.8	48.9
Special Industry Machinery	950.8	1,658.2	734.7
General Industry Machinery	56.1	97.8	45.6
Computers & Peripherals	55.0	95.9	103.9
Typewriters & Other Office Equipment	13.1	22.8	15.0
Service Industry Machinery	20.5	35.8	21.8
Electric Transmission Equipment	22.5	39.2	21.9
Electrical Industrial Apparatus	31.2	54.4	26.2
Household Appliances	74.4	129.8	80.7

Appendix Table II-D (continued)

	<u>1972</u> (\$ million)	<u>1980E<sup>1</sup></u> (\$ million)	<u>1980E<sup>2</sup></u> (1972 \$ million)
Motor Vehicles	114.0	198.8	110.0
Scientific & Controlling Instruments	21.8	38.0	18.0
Photographic Equipment & Supplies	21.3	37.1	19.9
Wholesale Trade	77.9	135.9	74.6
Retail Trade, except Eating & Drinking Places	18.8	35.2	19.8
New Construction	<u>410.3</u>	<u>715.6</u>	<u>323.9</u>
Total	2,025.6	3,535.0	1,733.2
Other <sup>3</sup>	<u>52.3</u>	<u>91.2</u>	<u>42.6</u>
Grand Total	2,077.9	3,626.2	1,775.8
Total Employment Required to Deliver Capital Goods to the Fiber/Textile/ Apparel Industrial Complex <sup>4</sup>	111,097		

E = estimated

n.e.c. = not elsewhere classified.

<sup>1</sup>Estimated by assuming the compound growth rate of the value of capital goods used by the industrial complex was 7.2 percent per annum. This compound growth rate is that which was calculated for the business expenditures for new plant and equipment of the textile industry between 1972 and 1980 as they appear in the 1978 and 1980 issues of the Statistical Abstract of the United States.

<sup>2</sup>The estimated 1980 values of the use of new capital goods in current dollars were deflated for each commodity by the output deflator of the relevant producing industries as they appear in U.S. Department of Labor, Time-series data for input-output industries -- output, price, and employment, October 6, 1981 (unpublished). The "other" category was deflated by the output deflator for all manufacturing.

<sup>3</sup>Includes those commodities for which the value of use was less than \$10 million in 1972.

<sup>4</sup>Estimated for those commodities which had a total value of use of at least \$10 million in 1972.

Source: U.S. Department of Commerce, Statistical Abstract of the United States, Bureau of the Census, 1980, 1978; U.S. Department of Commerce, New Structures and Equipment by Using Industries, 1972: Detailed Estimates and

## Appendix Table II-D (continued)

Methodology, Bureau of Economic Analysis, September 1980; U.S. Department of Labor, Time-series data for input-output industries -- output, price, and employment, Bureau of Labor Statistics, October 6, 1981, unpublished; U.S. Department of Labor, 1979 Employment Requirements Table, Bureau of Labor Statistics, 1979, unpublished; U.S. Department of Labor, 1972 Employment Requirements Table, Bureau of Labor Statistics, 1972, unpublished.

### III. THE ECONOMIC PERFORMANCE OF THE TEXTILE INDUSTRY

Given the significance of the textile industry in the nation's economy in terms of both employment and output, it is important to assess its performance over time. A healthy and expanding textile industry implies high employment for all low-skilled workers, especially females and minorities and, because of its economic linkage with other economic sectors from which it obtains inputs and supplies outputs, it would also produce employment opportunities in other industries throughout the U.S. Because of the wide diversity of the products of the textile complex, it is all but impossible to analyze the industry's components in any detail. For the sake of simplicity and because of the restrictions imposed by data limitations, the discussion will focus broadly on the apparel and textile products components of the fiber/textile/apparel complex.

#### The Consumption of Textiles

As in any industry, the economic fortunes of the textile industry are determined basically by the demand for products by consumers, including industrial and public sector users. The difficulties encountered in the measurement of consumption over time are numerous: changes in definitions of products that are included in various indexes, changes in product mix, price changes which are difficult to measure, and the problems inherent in the construction of index numbers. One measure of demand is in total pounds of product consumed. Annual data on total consumption of all textiles, apparel products, and non-apparel products are displayed for the years 1969 through 1979 in Table III-1. As is apparent from this table, the consumption of textiles in the form of apparel rose steadily between 1969 and 1973, at least as measured in pounds. After a reduction in consumption between 1973 and 1975, growth resumed through 1977. In 1978, physical consumption of apparel stood at about the same level as in 1973. A second decline occurred after 1977. With regard to non-apparel products, which include home textiles, e.g., linens and carpeting, and textile products used by industry, a decline in consumption occurred between 1969 and 1970; thereafter, consumption fluctuated so that by 1978 the total poundage consumed of non-textile products was not much different from the level in 1973. For all textiles, a similar pattern of fluctuation is revealed by the data in Table III-1; periods of steady growth are interrupted by intervals of one or two years of sharp decline after which the growth in consumption resumes. Overall, total consumption at the end of the period, as shown by the index was about 17 percent higher than in 1969.

These data clearly indicate an important economic characteristic of the textile industry: It follows the vagaries of the business cycle. Expansion of the industry has been interrupted by periods of decline reflecting the fact that in times of economic adversity, consumers reduce their consumption of the industry's output. The textile industry is especially affected by the

Table III-1  
 Total U.S. Consumption of Apparel Products, Non-Apparel Products,  
 and All Textiles, by Year, 1969-1980  
 (Millions of Pounds; Index, 1969 = 100)

	Apparel Products		Non-Apparel Products <sup>1</sup>		All Textiles	
	Consumption	Index	Consumption	Index	Consumption	Index
1969	4,660	100.0	5,678	100.0	10,338	100.0
1970	4,718	101.2	5,357	94.3	10,075	97.5
1971	5,078	108.9	6,263	110.3	11,341	109.7
1972	5,511	118.3	6,807	119.9	12,318	119.2
1973	5,747	123.3	7,189	126.6	12,933	125.1
1974	5,208	111.8	6,034	106.2	11,242	108.7
1975	5,129	110.1	5,743	101.1	10,872	105.2
1976	5,462	117.2	6,601	116.3	12,063	116.7
1977	5,787	124.2	6,492	114.3	12,729	123.1
1978	5,761	123.6	7,420	130.7	13,181	127.5
1979	5,406	116.0	7,502	132.1	12,908	124.9
1980	5,268	113.0	6,833	120.3	12,101	117.1

<sup>1</sup>Includes home furnishings (e.g., linens, towels, and draperies) and carpeting as well as textiles employed in industrial use.

Source: American Textile Manufacturers Institute.

fortunes of the automobile industry, for the production of automobiles requires many textile products in the form of carpeting, tire cord, and fabrics. There is a distinct possibility that the cyclical nature of the industry may be exaggerated by a physical measure of consumption such as pounds, but there is no question that the industry is cyclical in nature. The actual economic performance of the industry is related more closely to revenue flows than to the output of pounds of product. This is illustrated by an example from the apparel segment of the industry. The introduction and widespread acceptance of the miniskirt reduced noticeably the number of pounds of fabric required in skirt production generally; it is by no means certain, however, that the revenues of apparel manufacturers fell dramatically because of the popularity of this style.

Although data on expenditures for textile products are difficult to obtain, the U.S. Department of Commerce does provide estimates of annual expenditures of consumers on apparel, as shown in Table III-2. With the exception of a one-year decline between 1971 and 1972, dollar outlays on apparel more than doubled between 1967 and 1979, rising from \$36.0 billion to \$83.3 billion. This 131 percent increase in spending for apparel reflects the growth in the U.S. population (the number of consumers), increasing consumption per capita, and rising prices. The price index for apparel also rose steadily throughout the 1967-1979 period so that, by 1979, apparel goods which cost \$1.00 in 1967 cost about \$1.59 in 1979. Over the same period, goods in the overall Consumer Price Index that cost \$1.00 in 1967 cost \$2.17 in 1979. It would seem, for the U.S. consumer, apparel has been a real bargain. By correcting for the change in prices each year, real consumption spending on apparel can be measured, which is indicative of the quantity purchased. Consumer spending in real dollars rose from \$36.0 billion in 1967 to \$52.6 billion in 1979, or 46.1 percent. The quantity purchased rose steadily between 1967 and 1971 and, after a drop in 1972, remained at about the same level in 1973 and 1974 as in 1971. Growth resumed in 1975 and continued without interruption through 1979.

Together the information in Tables III-1 (the volume of consumption in pounds) and III-2 (the level of consumption in real dollars) indicate that the consumption of apparel and textile products in the 1960s and the 1970s was expanding, but not without interruption, because of the cyclical nature of the industry. When the demand for an industry's products increases over time, economists expect industry output to increase, the number of firms in the industry to increase, employment to rise (unless productivity improvement is so great that increased efficiency offsets the need for additional employment), rates of return on sales and assets to improve, and the prices received by producers to rise relative to the prices of other goods. An important question is the extent to which these changes can be observed in the textile industry.

#### Output of the U.S. Textile Industry

For the same reasons that it is difficult to obtain measures of textile consumption or demand, it is difficult to measure output or production. One group of indicators of U.S. output for apparel and textile mill products are the industrial production indexes developed by the Federal Reserve. These indexes are reported in Table III-3 for textile mill products and apparel products over the period 1967-1980; indexes for all industries and all manufacturing are also listed for purposes of comparison. With regard to apparel products, the industrial production index in Table III-3 is lower than that of consumption in Table III-2 in every year except 1976. In 1979, the index of apparel consumption was 46 percent higher than in 1967, but the index of apparel output was only 28.6 percent higher in 1979 than in 1967. To the extent that these indexes correctly reflect the consumption and

Table III-2  
 Consumption Expenditures on Apparel, Apparel Price Index, and  
 Real Spending on Apparel, by Year, 1967-1979  
 (Dollar amounts in billions; Index, 1967 = 100)

Year	Consumption Expenditure on Apparel in the U.S.	Apparel Price Index (1967=100)	Real Consumption Spending on Apparel	Index of Apparel Consumption
1967	\$36.0	100.0	\$36.0	100.0
1968	39.1	105.7	37.0	102.8
1969	42.2	111.9	37.7	104.7
1970	44.0	116.3	37.8	105.0
1971	48.4	119.9	40.4	112.2
1972	46.2	122.3	37.8	105.2
1973	51.2	126.5	40.5	112.4
1974	55.0	135.7	40.5	112.6
1975	59.3	140.6	42.2	117.2
1976	63.6	144.9	43.9	121.9
1977	69.1	150.6	45.9	127.5
1978	77.2	154.2	50.1	139.2
1979	82.7	158.5	52.2	145.0

Source: U.S. Department of Commerce, Survey of Current Business, various issues.

Table III-3  
 Indexes of Industrial Production for the Total Index,  
 All Manufacturing, Textile Mill Products, and Apparel Products,  
 by Year, 1967-1980, (1967 = 100)

Year	Total Index	All Manufacturing	Textile Mill Products	Apparel Products
1967	100.0	100.0	100.0	100.0
1968	105.7	105.7	108.8	101.6
1969	110.0	110.5	113.2	102.5
1970	106.7	105.2	106.3	97.8
1971	106.8	105.2	108.6	97.8
1972	115.2	114.0	117.4	105.7
1973	125.6	125.2	127.1	112.9
1974	129.3	129.4	132.8	114.3
1975	117.8	116.3	122.3	107.6
1976	135.5	130.3	134.6	125.7
1977	138.2	138.4	134.4	134.2
1978	146.1	146.8	137.5	134.2
1979	152.1	153.6	145.0	134.4
1980	147.1	146.6	136.8	128.6

Source: Federal Reserve Bulletin, various years.

production of apparel, the U.S. apparel manufacturing industry has grown more slowly than has consumer demand. The same conclusion may be drawn from the data on the consumption of apparel when measured in pounds, although the comparison of the index numbers in Tables III-1 and III-3 must be regarded with caution because the base years for the computations are different -- 1969 in one case and 1967 in the other. Unfortunately, in the case of textile mill products, a direct comparison cannot be made between consumption in Table III-1 and the index of production in Table III-3, because of differences in the items covered in the two indexes.

In any case, it is apparent from Table III-3 that the output of textile mill products and apparel products grew less rapidly than the output of all manufacturing firms and the output of all firms in the economy. The growth of the apparel industry has been particularly slow relative to the rest of the economy. The fact that the growth of domestic consumption of apparel has been more rapid than domestic output indicates that imports are capturing the domestic apparel market -- an issue considered in detail in section IV.

#### The Number of Firms in the U.S. Textile Industry

The Internal Revenue Service publishes data from corporate income tax returns by industrial sector. Table III-4 contains information on the total number of firms and their distribution by asset size for both textile mill products and apparel and related products for the years 1969 (the first year that these statistics were published) through 1976 (the last year for which data are available). The data reveal that, although the output of the industry is growing over time, the number of firms engaged in the manufacture of apparel and textile mill products has declined steadily.

The total number of firms in textile mill products was 6,908 in 1969; this figure had declined to 4,690, almost one-third, by 1976. The number of firms in apparel declined by more than 17 percent in the same period, from 19,060 firms to 15,756. These two components of the textile industry are clearly labor rather than capital intensive, for more than half of the textile mill products firms and well over two-thirds of the apparel firms have total assets of less than \$500 thousand. This indicates further that the industry is highly competitive, since large amounts of capital are not required to enter. Capital requirements pose major entry barriers in such segments of manufacturing as autos, steel, and cement so that production is concentrated among a small number of firms.

The smaller firms, however, are leaving both segments of the textile industry. For example, the number of textile mill products corporations with assets of less than \$100 thousand fell by almost 50 percent in seven years. The only category in which the number of firms has increased over time is that of over \$5 million in assets. Apparently, economic conditions in the industry are much less favorable for the small producer. At least in part, this may be explained by cost considerations that have made the industry less attractive over time to the small producer. The costs of government regulation, as discussed in section V, fall disproportionately on the small firm, which often lacks the financial resources required to comply with regulations. To the extent that there has been growth in the industry, it has been concentrated primarily in larger firms.

Table III-4  
 Number of Firms in Textile Mill Products and Apparel Industries Classified by Asset  
 Size, by Year, 1969-1976 (Based on Corporate Income Tax Returns)

Years	Textile Mill Products				Apparel and Related Products				
	Total Firms	\$0 to \$100k	Asset Size \$100k to \$500k	Over \$5mill	Total Firms	\$0 to \$100k	Asset Size \$100k to \$500k	Over \$5mill	
1969	6,908	2,411	2,147	1,891	19,060	9,625	5,826	3,108	264
1970	6,221	1,754	2,389	1,750	18,136	9,620	5,292	2,957	267
1971	5,846	1,862	1,944	1,717	17,037	8,552	5,435	2,789	261
1972	6,057	1,690	2,204	1,792	17,507	8,645	5,463	3,065	334
1973	5,769	1,825	1,867	1,606	16,925	8,162	5,336	3,064	363
1974	6,274	2,266	1,959	1,610	16,106	7,766	4,935	3,034	371
1975	5,390	1,698	1,762	1,480	15,944	7,170	5,418	3,003	353
1976	4,690	1,240	1,544	1,483	15,756	7,031	5,222	3,082	421

Source: Internal Revenue Service, Corporate Income Tax Returns, various years.

### Assets of the U.S. Textile Industry

One measure of the resources devoted to the production of textiles is the total assets, although total assets cannot be equated to physical capital such as plant and equipment because cash on hand, receivables, and other items are also included. Table III-5 contains data provided by the IRS on total assets of apparel manufacturers, textile mill products corporations, all manufacturing firms, and all firms in the U.S. economy. Note first that the assets of firms in all industries and in the manufacturing sector of the economy have grown steadily throughout the 1969-1976 period. The assets of all industries increased by 93 percent (from \$2.4 trillion to \$4.7 trillion) and the assets of all manufacturing firms rose by about 81 percent (from \$.57 trillion to \$1.0 trillion). The increase in assets was much more modest for both textile mill products -- a 20.4 percent rise from \$15.5 to \$18.7 billion -- and apparel -- an increase of 37 percent from \$11.1 to \$15.2 billion. In addition, there were years in which the level of total assets declined for the two components of the textile industry so that the growth was not continuous.

Table III-5  
Total Assets of All Industries, All Manufacturing Firms,  
Textile Mill Product Firms, and Apparel and Other Textile Products Firms,  
by Year, 1969-1976

Year	Total Assets in Billions of Dollars			
	All Industries	All Manufacturing	Textile Mill Products	Apparel
1969	\$2,445.63	\$ 572.13	\$15.51	\$11.10
1970	2,634.71	612.91	14.85	11.27
1971	2,889.22	646.65	15.20	11.41
1972	3,256.83	698.66	17.22	15.13
1973	3,648.92	768.16	18.53	14.73
1974	4,016.47	885.82	19.14	13.84
1975	4,286.56	944.58	19.14	13.77
1976	4,720.94	1,034.60	18.68	15.22

Source: Internal Revenue Service, Corporate Income Tax Returns, various years.

There is no price index which permits adjustment of the asset data to correct for price changes so that total assets may be converted to constant dollars. The purchasing power of the dollar, however, declined steadily throughout this period due to

rapid inflation. Since assets of textile mill products firms were approximately the same in 1973 and 1976 and those of apparel firms almost identical in 1972 and 1976, it is quite clear that the total real resources controlled by these two segments of the textile complex has declined over time.

### Employment in the U.S. Textile Industry

Table III-6 contains average annual employment data for the period 1969-1981 for various sectors of the economy. Total nonagricultural private employment has risen by about 30 percent, from 70.4 million in 1969 to 91.5 million in 1981. For the manufacturing sector of the economy, total employment remained almost constant throughout this period at roughly 20 million. Thus, manufacturing has declined in relative terms and employment growth has been in services rather than in manufacturing; the number of white-collar workers is rising relative to the number of blue-collar workers. In both absolute and relative terms, all segments of textile employment have been falling over time.

As mentioned briefly earlier, employment in an industry may not increase even if output rises. An increase in labor productivity, i.e., a rise in output per unit of labor input, can permit additional output to be produced with the same number or even fewer employees. Such increases in efficiency are often obtained by the introduction of new processes or labor-saving capital equipment. There have been a number of technological innovations which have increased the capital intensity of the textile industry, such as high-speed weaving machines with numerically controlled accessories, electronically controlled knitting machines, transfer printing devices, and optical scanners that are used for quality control. Part of the reason for the decline in the number of small firms is that such equipment is costly and not affordable for small producers. Thus, technological change in the highly competitive industry has favored large relative to small firms. The introduction of labor-saving devices has contributed to the decline in industry employment over time, but this change cannot explain industry employment losses, especially in the apparel segment, which remains very labor intensive and has experienced much less technological progress.

### Rates of Return on Sales, Total Assets and Net Worth

In Table III-7, annual rates of return on sales and total assets (net income before the tax as a percent of sales and total assets) are computed for all manufacturing industries, textile mill products, and apparel over the period 1969 through 1976. The rate of return on sales, the sales margin, is lower in every year for textile mill products and apparel than for all manufacturing. With regard to total assets, the rate of return for textile mill products is lower than for all manufacturing industries in all but one of the eight years; for apparel the rate of return on assets is higher than for all manufacturing industries

Table III-6  
Average Annual Employment for the Nonagricultural Sector,  
All Manufacturing, Textile Products, and Apparel,  
by Year, 1969-1981  
(Thousands of Employees)

Year	Total Nonagricultural	All Manufacturing	Textile Mill Products	Apparel & Related Products	All Textiles
1969	70,375	20,168	1,002.6	1,409.2	2,411.8
1970	70,883	19,371	975.0	1,364.0	2,339.0
1971	71,205	18,623	954.3	1,342.8	2,297.1
1972	73,067	19,150	985.8	1,382.7	2,368.5
1973	76,778	20,153	1,009.6	1,437.9	2,447.5
1974	78,280	20,080	965.3	1,363.0	2,328.3
1975	79,946	18,320	867.7	1,243.4	2,111.1
1976	79,386	19,003	919.1	1,318.7	2,237.8
1977	82,463	19,688	910.4	1,316.8	2,227.2
1978	86,688	20,507	899.3	1,332.6	2,231.9
1979	89,888	21,062	888.7	1,312.7	2,201.4
1980	90,564	20,300	852.7	1,265.8	2,118.5
1981 <sup>1</sup>	91,466	20,319	842.7	1,253.9	2,096.6

<sup>1</sup>Annual average based on seasonally adjusted data for January through July.

Source: U.S. Department of Labor.

in all but two years, 1972 and 1974. As was true of output, rates of return fluctuated over time and there is no indication of either steady growth or decline in the percentages. Low profit margins on sales are indicative of highly competitive pricing in both the textile mill products and apparel segments of the industry.

#### Prices Received by Textile Producers

In an expanding industry with growing consumer demand, economists would expect, other things held constant, the prices to keep pace with the general rise in the price level or even to increase relative to the prices received by producers of other goods. Table III-8 presents price indexes for apparel, textile

Table III-7

Net Income as a Percent of Sales, Total Assets and Net Worth for  
All Manufacturing, Textile Mill Products, and Apparel, by Year, 1969-1976

Year	All Manufacturing Industries			Textile Mill Products			Apparel		
	Net Income as a Percent of Sales	Total Assets	Net Income as a Percent of Sales	Total Assets	Net Income as a Percent of Sales	Total Assets	Net Income as a Percent of Sales	Total Assets	
1969	6.56	7.91	4.98	7.08	3.78	8.22			
1970	5.42	6.19	4.53	6.55	3.65	7.50			
1971	5.95	6.91	4.27	6.50	3.81	8.07			
1972	6.27	7.55	4.42	6.79	3.87	7.01			
1973	6.73	8.58	4.67	7.41	4.33	8.76			
1974	6.25	8.83	3.97	6.36	3.47	7.57			
1975	5.92	7.88	3.43	5.32	4.01	9.14			
1976	6.72	9.18	4.36	7.67	4.47	10.17			

Source: Internal Revenue Service, Corporate Income Tax Returns, various years.

Table III-8  
 Producer Price Indexes for Apparel, Textile Home Furnishings,  
 All Textiles, and All Manufacturers and the Consumer Price  
 Index, by Year, 1967-1979  
 (1967 = 100)

Year	Producer Price Indexes				Consumer Price Index
	Apparel	Textile Home Furnishings	All Textiles <sup>1</sup>	All Manufacturers	
1967	100.0	100.0	100.0	100.0	100.0
1968	103.6	104.2	103.7	102.6	104.2
1969	107.4	100.8	106.0	106.2	109.8
1970	111.0	103.6	107.0	110.2	116.3
1971	112.9	104.2	108.6	113.8	121.3
1972	114.8	109.2	113.6	117.9	125.3
1973	119.0	113.3	123.8	129.2	133.1
1974	129.5	143.1	139.1	154.1	147.7
1975	133.4	151.9	137.9	171.1	161.2
1976	139.9	159.3	148.2	179.0	170.5
1977	147.3	171.3	154.0	190.1	181.5
1978	152.4	178.6	159.8	204.2	195.4
1979	160.4	190.4	168.7	236.5	217.4

<sup>1</sup>Including Synthetic Fibers, Processed Yarn and Threads, Gray Fabrics and Finished Fabrics.

Source: U.S. Department of Commerce, Survey of Current Business, various issues.

house furnishings, all textiles, and all manufacturers. Also shown is the Consumer Price Index. Prices received by producers for apparel, textile home furnishings, and all textiles rose steadily throughout the 1967-1979 period. However, while the increase in the price index for all manufacturing rose by 136.5 percent, the apparel index rose by only 60.4 percent, textile home furnishings by 90.4 percent, and all textiles by 68.7 percent. Therefore, the prices of textile products relative to other manufactured products fell consistently throughout the period. The Consumer Price Index as well was higher in each year than any of the textile producer price indexes, which have not kept pace with general price movements over the past thirteen years.

### The Findings

Although there are admittedly weaknesses in the aggregates and the indexes used throughout this section to assess the economic performance of the textile industry, the empirical evidence leads to one basic conclusion. Despite the growing consumption of textile products in the U.S. over time, the domestic industry is beset by serious problems: The output has not kept pace with consumption, the number of firms has declined over time as small firms leave the industry, the resources devoted to the production of textile products is lower in both real and absolute terms than in earlier years, employment has been reduced, rates of return are low relative to the rest of the manufacturing sector, and prices received by textile producers have not kept pace with general price level increases.

As shown in the next section, imports are capturing an increasing share of the U.S. market for textiles; because the growth rate in consumption has slowed considerably in the past few years, a high rate of growth in imports indicates an accelerating erosion in the U.S. market so that the economic fortunes of the domestic producers may deteriorate at an even more rapid pace than in the past. As imports increase, more firms can be expected to leave the industry creating growing unemployment in both the primary and secondary sectors. Given the significance of the industry in the U.S. economy, such a dislocation could have serious economic consequences.

#### IV. IMPORTS AND THE U.S. TEXTILE INDUSTRY

The U.S. textile industry is fiercely competitive -- not only domestically, but also internationally. For the past five decades, and especially the last twenty years, foreign competitors have deeply penetrated the U.S. textile market, earning significantly larger market shares. Because of its importance to the U.S. economy, the textile industry has for decades operated with various forms of import controls aimed at reducing market disruptions (i.e., unemployment, bankruptcy) caused by surges in textile imports. In this section a brief description of past and present U.S. government policies toward textile imports and their consequent growth is presented to illustrate the economic effects of current international textile agreements on imports into the U.S.

##### Textile Import Quotas: A Brief History

The Japanese, an industrial people with no shortage of entrepreneurial talent, recognized early in the twentieth century that textiles could play a major role in their economic development. There would always be a domestic market for clothing and textile goods, and the relatively affluent American market offered a large potential export market.<sup>1</sup> Consequently, by the mid-1930s, the Japanese were the major suppliers of textile imports to the U.S. In 1935, President Roosevelt appointed a cabinet committee composed of the Secretaries of State, Agriculture, Labor, and Commerce to study the textile import problems and recommend a solution. The committee suggested that "steps be taken to control these imports, preferably by means of a voluntary and friendly agreement with Japan on limitations of shipments of cotton products to the American market." Such an agreement on "voluntary" import quotas was consummated in that year.

With the outbreak of World War II, the textile import problem all but disappeared. In fact, for a number of years following the war, the U.S. was the only major undamaged textile producer in the world. With the help of massive foreign aid from the United States after the war, the Japanese textile industry was revitalized and by the mid-1950s was exporting enough to the U.S. to induce President Eisenhower to negotiate with Japan a five-year program of export restraints, effective January 1, 1957.

At that time, a number of less developed countries (LDCs), which were receiving U.S. foreign aid, particularly Hong Kong, Taiwan, and South Korea, began to view the labor intensive production of cotton textile and apparel goods, as had Japan, as a key to their economic development. Being "capital poor" but "labor rich" enabled these countries to produce textile products at an

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<sup>1</sup> The following is based on R. Buford Brandis, "Textile Import Quotas: A Short History" (Washington, D.C.: American Textile Manufacturers Institute, May 1979).

average hourly wage much lower than the American wage, which gave them a competitive labor advantage. Although most of the labor force in these countries was unskilled, it was suitable for the production of textile and apparel goods. Further, the development of the textile trade was an attractive path for the LDCs to follow since domestic markets were assured, and foreign markets, particularly the U.S., were becoming increasingly lucrative. The subsequent surge in textile exports to the U.S. from the LDCs in the late 1950s and early 1960s led the U.S. government to initiate multilateral discussions on trade in textiles under the auspices of the General Agreement on Tariffs and Trade (GATT). These negotiations aimed to promote the economic development of the LDCs via orderly growth of the textile trade, while simultaneously limiting "market disruptions" or the threat thereof in the developed countries.<sup>2</sup> The factors causing market disruptions are defined as containing the following elements, generally in combination:

- i) a sharp and substantial increase or imminent increase of imports of particular products from particular sources; and
- ii) offering these products at prices which are substantially below those prevailing for similar goods of comparable quality in the market of the importing country.

Discussion of such incidents, which had altered the terms of trade in favor of the LDCs, resulted in a compromise known as the Short-Term Cotton Textile Agreement (STA) to cover the period October 1, 1961 to September 30, 1962. During that time, a Long-Term Arrangement (LTA) was agreed upon which was to be in effect, initially, for five years. The LTA was designed so that during the five-year period structural changes could be made in the U.S. and other industrialized countries that would enable them to compete without further import restraints. Little was done, however, to address any structural problems, and imports of wool and man-made fiber products, which were not covered by the LTA, increased rapidly after 1967. Even with the stipulations of the LTA, imports of cotton products to the U.S. increased from 5.2 percent of domestic consumption in 1961, when the first GATT was negotiated, to 14.3 percent in 1973.<sup>3</sup>

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<sup>2</sup> A detailed description is found in Joseph Peltzman, The Competitiveness of the U.S. Textile Industry (Columbia, South Carolina: University of South Carolina, 1980), Research Monograph. It should be noted that Article 19 of the GATT requires countries which impose quotas to pay compensation for such restraints. The MFA exempts the textile industry from these requirements, which has had led to a more widespread use of quotas.

<sup>3</sup> Ibid.

Since the growing tide of imports was continuing to disrupt the domestic markets of numerous developed countries, work was begun on a new textile trade agreement, which was accepted on December 20, 1973, by some fifty governments.

#### The Multifiber Arrangement<sup>4</sup>

The new agreement regarding international trade in textiles, referred to as the Multifiber Arrangement (MFA), became effective January 1, 1974, was extended in late 1977 for another four years, and again in 1981 until July 1, 1986. Unlike the LTA which applied solely to cotton textiles and apparel, the MFA includes textile and apparel products made of cotton, wool, and man-made fibers. Under the provisions of the MFA, a country may restrain imports of textile and apparel products through the negotiation of bilateral agreements or, where no agreement can be reached, through unilateral action. The U.S. has entered into at least thirty-five such agreements, of which twenty-four are now in effect. A major element of the MFA is the requirement that, for most apparel categories, imports grow at a minimum 6 percent annual rate, regardless of the growth rate of domestic consumption. In addition, there are "flexibility provisions" which allow for the allocation of an unused portion of the previous year's quota to the present year, for borrowing from the succeeding year's quota, and for transferring between product quotas. Such provisions have thus allowed imports of some products from some countries to grow by as much as 24 percent per year at times when domestic consumer demand was growing at 1 to 2 percent. The flexibility provisions of the MFA have therefore magnified the losses incurred by the U.S. textile industry due to foreign competition.

The textile and apparel industry, like many others, is cyclical. In the troughs of the business cycle, when demand for textiles (and other goods) is low, sales and profits of domestic suppliers decline. In such instances, foreign suppliers may reduce the growth of exports reserving the growth potential for periods when demand is stronger, taking advantage of the flexibility provisions. As the business cycle progresses and consumer demand recovers, both domestic and foreign suppliers would normally experience an increase in sales and profits, which would compensate them for losses sustained during the previous downturn. Under the flexibility provisions, however, foreign suppliers, who can increase exports of particular products by as much as 24 percent per year, even when consumer demand rises only modestly,<sup>5</sup> can gain a substantially larger share of the apparel market. This is the case when the quota has been completely filled in the prior year and suppliers can increase shipments of a given product by about

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<sup>4</sup> The text of the MFA is found in Peltzman.

<sup>5</sup> American Textile Manufacturers Institute, The Multifiber Arrangement and American Jobs (Washington, D.C.: ATMI, 1981).

18 percent. The increased market share going to foreign suppliers during periods of economic recovery prevents the full recovery of domestic suppliers from losses incurred during the previous market decline. Thus, in recent years the flexibility provisions of the MFA have also caused major disruptions in the U.S. industry.

The U.S. industry has asked for a readjustment of the growth provisions so that increases in imports would be more closely linked to the growth in a country's domestic consumption. President Reagan, as a candidate, endorsed this suggestion by stating that "...the MFA...needs to be strengthened by relating import growth from all sources to domestic growth."<sup>6</sup>

### The Increasing Volume of Textile Imports

Despite all the attempts to limit textile imports in the past two decades, they have grown steadily, and in some areas, dramatically. Just twenty years ago, when the Japanese, Taiwanese, Korean, and Hong Kong textile industries were beginning to develop, apparel imports to the U.S. were all but nonexistent; now they comprise approximately 25 percent of the total U.S. market. The sale of many apparel items is now largely dominated by foreign producers, as shown in Table IV-1, which lists ratios of imports to domestic production for selected apparel items in 1980. Imports of items, such as women's wool sweaters and cotton blouses, are one-and-one-half to two-and-one-half times domestic production.

The volume of textile and apparel imports has increased quite rapidly during the past decade, as shown in Table IV-2 and Figure IV-1. Cotton apparel items have accounted for the largest increase in imports, growing by 102 percent between 1971 and 1980. Man-made fiber apparel imports increased less dramatically (by 16 percent) during that time. Combined cotton and man-made fiber apparel imports increased by 37 percent.

Figure IV-1, based on data in Appendix Table IV-1, plots the growth of clothing and textile imports in constant dollars from 1969 to 1979. During that period, clothing imports increased by 256 percent in real terms, from \$1.03 billion in 1969 to \$3.67 billion in 1979. Textile imports increased by 36 percent, from \$.96 billion to \$1.31 billion, while total imports surged by 150 percent.

In light of the data presented in section III which demonstrated that textile demand in the U.S. is growing at a much faster pace than domestic production, these import statistics clearly show that foreign producers are earning larger and larger market shares. These shares are enhanced under the Multifiber Arrangements of 1973 and 1977, which have been interpreted to

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<sup>6</sup> As quoted in Margaret Price, "Textile Firms Push Globalization Plan," Industry Week, December 8, 1980, p. 32.

Table IV-1  
 Import - Production Ratios, Selected Apparel Items, 1980

Item	Ratio of Imports To Domestic Production
Women's Wool Sweaters	2.70
Women's Cotton Blouses	1.61
Men's Wool Knit Shirts	1.56
Man-made Fiber (MMF) Gloves	1.49
Women's MMF Sweaters	1.31
Women's Cotton Coats	1.27
Women's Cotton Knit Blouses	1.03
Men's Wool Sweaters	.90
Men's Cotton Woven Shirts	.89
Men's Cotton Sweaters	.85
Men's MMF Sweaters	.84
Women's Cotton Slacks	.69
Women's MMF Coats	.66
Women's MMF Knit Blouses	.64
Cotton Skirts	.62
Men's Wool Suits	.59
Men's MMF Woven Shirts	.58
Men's Wool Slacks	.56
Men's MMF Coats	.55

Source: American Textile Manufacturers Institute

Figure IV-1  
CLOTHING AND TEXTILE IMPORTS: 1969-79  
(Billions of Constant 1967 Dollars)

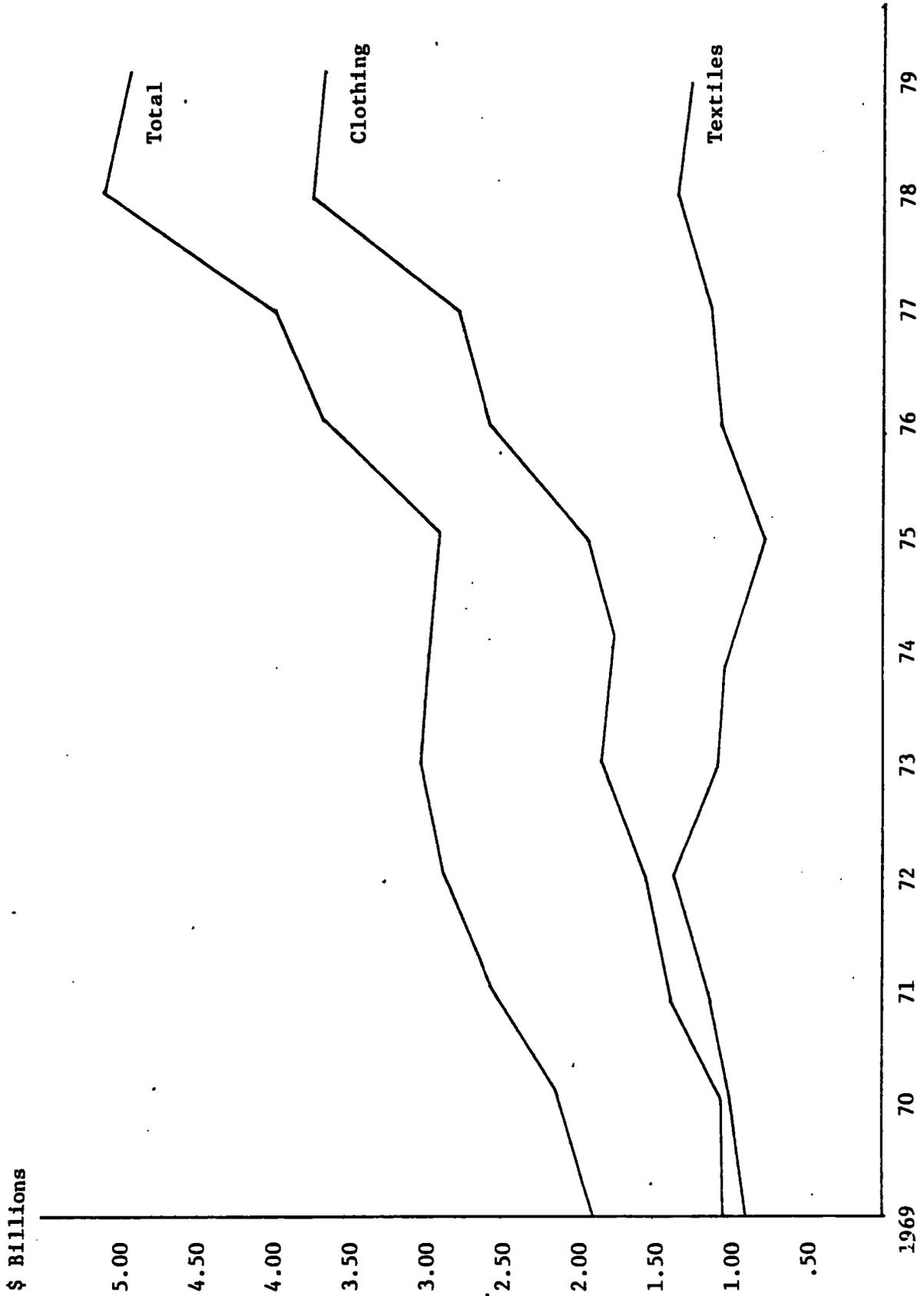


Table IV-2  
 U.S. Apparel Imports: 1971-1980  
 (Millions of Equivalent Square Yards)

Apparel Imports			
Year	Cotton Fiber	Man-made Fiber	Total
1971	497.8	1,536.1	2,033.9
1972	545.0	1,605.5	2,150.5
1973	448.9	1,580.9	2,029.8
1974	448.8	1,433.5	1,882.3
1975	540.4	1,486.6	2,027.0
1976	692.7	1,685.5	2,378.2
1977	760.8	1,607.9	2,368.7
1978	941.9	1,865.8	2,807.7
1979	934.9	1,652.6	2,587.5
1980	1,004.1	1,786.6	2,790.7

Source: U.S. Department of Commerce

allow a minimum import growth of 6 percent per year at a time when annual domestic output was growing at approximately 1.5 percent.

The three largest suppliers of imports to the U.S. are, respectively, Hong Kong, South Korea, and Taiwan, accounting for about 60 percent of all U.S. apparel imports.<sup>7</sup> Imports from "the big three" have skyrocketed in recent years, from \$603 million in 1970 to \$4.5 billion in 1980 -- a 646 percent rise in just one decade. Japan and China are the next largest suppliers. China, in particular, with its massive labor resources, has the potential to vastly expand its production and export of textiles. Since the first step toward normalization of relations with China, imports have increased by 128 percent between 1977 and 1978, and by another 180 percent by 1981.<sup>8</sup> Textile and apparel imports

<sup>7</sup> U.S. Department of Commerce, Bureau of the Census, Statistical Abstract of the U.S. (Washington, D.C.: Department of Commerce, 1981).

<sup>8</sup> "How China Will Alter the Far Eastern Market," Business Week, March 5, 1979, p. 46; and U.S. Department of Commerce, Major Shippers Report: Textile and Apparel General Imports (Washington, D.C.: Department of Commerce, 1981).

from China have grown faster than those of any other supplier in the past two years, and now comprise about 10 percent of all imports. The Chinese are well aware that the textile industry played an important role in England's industrial revolution, and was also a leading economic sector during the early industrialization of Japan as well as Hong Kong, Taiwan, and other developing countries. Consequently, the Chinese textile industry is already quite developed and poised to gain an increased share of international markets. Textiles and apparel have made up to 20 to 25 percent of total Chinese exports in recent years and have earned about one-fifth of China's total foreign exchange.<sup>9</sup> In domestic trade, textile products accounted for one-fifth of China's retail sales, and in 1978 there were about 4,000 textile enterprises in China, employing close to 3 million workers.<sup>10</sup> Despite problems of bureaucratic inefficiency and mismanagement that characterize socialist enterprises throughout the world, the Chinese textile industry continues to grow, as more resources are devoted to it. Most recently, the "Ministry of Textile Industry" established the "Society for the Study of Technology and Economic Management" and an "Association of Textile Enterprise Management" to reorganize and "modernize" China's garment factories.<sup>11</sup>

In addition to China, a number of other Asian countries, such as Indonesia, the Philippines, Singapore, and Thailand, provide substantial import competition.

#### Textile Imports and the U.S. Economy

Clearly, textile imports have been gaining a larger and larger share of the U.S. market in the past few decades, particularly since the advent of the Multifiber Arrangement in 1974. One direct result is at least a temporary increase in unemployment in the U.S. textile and apparel industry and in many other related industries as well. Problems of unemployment among textile workers are perhaps more severe than in many other industries because these workers are relatively unskilled and less mobile than workers in other industries. Consequently, displacement of American workers due to foreign imports is likely to lead to increased unemployment of a longer duration. Unemployment among apparel textile workers also has a proportionately greater effect on women and minorities than in other manufacturing industries, given that women and minorities comprise 67 and 29 percent of textile employment respectively, compared to 31 and 18 percent in all manufacturing. Higher unemployment inhibits the process of "human capital investment" whereby work experience and the development of various skills lead to higher productivity and, consequently, higher income levels.

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<sup>9</sup> Ibid.

<sup>10</sup> Ibid.

<sup>11</sup> "China Groups to Aid Textile Industry," Daily News Record, August 25, 1981.

In addition to the costs of unemployment borne by textile workers themselves, there is also the burden borne by taxpayers who must finance increased unemployment and welfare benefits.

There are, of course, benefits which may accrue to other sectors of the economy as a result of textile imports. If imported textile and apparel goods sell for less than domestic goods, there may be some positive "wealth effect." That is, consumers will have more wealth which they will spend on other goods (as well as on textile products). The increased demand for other goods will draw some resources into the production of those goods, raising employment and output in other sectors of the economy. This scenario assumes, however, that increased imports will not affect the trade deficit. In fact, increased imports will increase the trade deficit, which leads to a depreciation of the dollar on foreign exchange markets, which in turn causes an increase in the dollar price of U.S. imports. The increased price of U.S. imports may then generate a negative wealth effect, which would reduce output and employment throughout the economy.

It is quite difficult to determine quantitatively the effects of increased imports on the total level of unemployment. However, a recent study by the Library of Congress, undertaken for the House Ways and Means Committee, concluded that "low cost imports do not result in any price benefit to the consumer, but simply allow clothing retailers to take bigger markups than they can take on apparel made in the U.S."<sup>12</sup> To the extent that this is true, the wealth effects of low-cost imports would be concentrated among the retailers of foreign textile products so that the principal beneficiaries are not consumers, but foreign producers, U.S. retailers, and firms associated with such enterprises.

A recent study by Economic Consulting Services, Inc. (ECS) in Washington, D.C.<sup>13</sup> attempted to determine the direct and indirect employment effects of increased textile imports. Basically, ECS's approach was to tabulate the employment requirements, across industries, for a given volume of textile product output, making use of an input-output model of the U.S. economy developed by the U.S. Department of Commerce. The direct job losses due to imports were found to be concentrated in the apparel sector; of the total job loss of approximately 313,000 in 1978, it was estimated that 279,300 or 89 percent were apparel workers. Even more workers were found to be displaced by apparel imports in sectors supplying the apparel industry, including 100,000 workers in fabric, yarn, and thread mills and 54,400 workers in the

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<sup>12</sup> U.S. House of Representatives, Subcommittee on Trade, Library of Congress Report on Imports and Consumer Prices (Washington, D.C.: U.S. Government Printing Office, July 19, 1977).

<sup>13</sup> Economic Consulting Services, Inc., Fibers/Textile/Apparel: A Unified Industry Dealing with the Import Problem (Washington, D.C.: ECS, January 8, 1981).

hosiery and knit goods sector. An additional 157,000 jobs were lost in other related industries as well, bringing the total estimated job loss in 1978 to approximately 624,000 workers.

Foreign Competition and the Future of the U.S. Textile Industry

The evidence clearly reveals that the U.S. textile industry has been and still is rapidly losing ground to such foreign producers as Hong Kong, Taiwan, South Korea, and Japan, who now dominate nearly one-fourth of the total U.S. apparel market. These nations and others, such as China, are continuing to develop their textile industries and to expand their exports. The combination of the modest U.S. growth rate (about 1.5 percent annually in physical volume) and the 6 percent or more allowed exporters under the terms of the Multifiber Arrangement portends the eventual demise of domestic textile production and the economic benefits associated with the industry. As illustrated by the experiences of World War II, systematic reliance on distant foreign sources for products essential to human survival and industrial production in a world of uncertainty can be extremely hazardous.

Appendix Table IV-1  
Clothing and Textile Imports: 1969-79  
(Millions of Constant 1967 Dollars)<sup>1</sup>

Year	Clothing	Textiles <sup>2</sup>	Total
1969	\$1,032	\$ 961	\$1,993
1970	1,143	1,061	2,204
1971	1,346	1,276	2,622
1972	1,637	1,339	2,976
1973	1,822	1,274	3,096
1974	1,793	1,161	2,954
1975	1,926	871	2,797
1976	2,595	1,104	3,699
1977	2,789	1,127	3,916
1978	3,722	1,375	5,097
1979	3,673	1,311	4,984

<sup>1</sup>Nominal amounts deflated by the producer price index.

<sup>2</sup>Includes textile yarn and thread, woven cotton fabrics, twine and cordage, floor coverings, and non-cotton woven fabrics.

Source: U.S. Department of Commerce, Bureau of the Census, Statistical Abstract of the U.S. (Washington, D.C.: Department of Commerce, 1980).

## V. CAUSES OF INDUSTRIAL DECLINE: THE ROLE OF THE FEDERAL GOVERNMENT

Over the past several decades, government has dramatically increased its influence over the affairs of private businesses and individuals. In particular, government regulation of industry has been greatly expanded and has produced various benefits, albeit nebulous at times, as well as many costs, sometimes nebulous and often severe. Three major types of regulation, regardless of any benefits achieved, have increased the cost of producing textile and apparel goods by billions of dollars in the past decade. Job safety regulation, environmental regulation, and the regulation of labor relations are discussed here in order to show that the costs imposed by these regulations are likely to have contributed substantially to the decline of the U.S. textile industry and its competitive position relative to foreign firms.

The costs imposed on American textile firms by regulation are rarely imposed by the governments of competitors such as Hong Kong, Taiwan, and South Korea. In fact, many foreign governments heavily subsidize their textile industries in ways that put the U.S. textile firms at an even greater disadvantage. In addition to reducing the competitiveness of the U.S. textile industry by imposing an ever increasing regulatory burden, the U.S. government has indirectly subsidized the textile (and other) industries of foreign countries through its many foreign aid programs. In essence, even though there may be economic and strategic benefits to various types of foreign aid, such aid frees resources of the recipient countries which can then be devoted to the subsidization of their textile (and other) industries. For example, providing nearly all of the defense capabilities of Japan allows that country to forego the "guns versus butter" trade-off in favor of all "butter," including many textile products. In effect, countries which export government-subsidized textile goods are also exporting their unemployment to the U.S.

### Job Safety Regulations

The Occupational Safety and Health Administration (OSHA) was created in December 1970 with the intention of improving the health and safety of workers. OSHA is authorized to establish responsibilities and rights for employers and employees, to set mandatory job safety standards, to enforce such standards, to encourage states to take responsibility for administering and enforcing their own programs, and to report procedures on job injuries, illnesses, and fatalities.<sup>14</sup> Compliance with OSHA regulations is enforced through inspections which may be triggered by serious accidents, complaints, or they may be random.

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<sup>14</sup> A detailed discussion of OSHA is found in Murray L. Weidenbaum, Business, Government, and the Public, Second Edition, (Englewood Cliff, New Jersey: Prentice Hall, 1981), pp. 79-91.

Even though everyone is in favor of improved safety in the workplace, the public's reaction to OSHA has generally been negative, and it has been severely criticized by business, labor, academic researchers, the media, and the government. The conclusions of a major study by Albert Nichols and Richard Zeckhauser of Harvard University are typical of academic reactions: "OSHA has become a prominent symbol of misguided federal regulation. It accomplishes little for occupational safety and health, yet imposes significant economic costs."<sup>15</sup> Many safety professionals feel that OSHA's reliance on setting standards and requiring capital expenditures is misguided because they believe that workers' behavior is the prime determinant of accidents.<sup>16</sup> A number of studies have shown that most accidents on the job do not involve violating standards; they are attributed to human carelessness. Thus, even if full compliance with OSHA's standards were achieved, large numbers of job-related accidents and illnesses would still occur.<sup>17</sup>

The costs of OSHA regulation include billions of dollars of required plant and equipment outlays (\$3.4 billion in 1978 according to one estimate),<sup>18</sup> as well as the paperwork burden and the cost of using skilled management to monitor regulatory requirements rather than monitoring production, costs which are difficult, if not impossible to quantify.

All segments of the textile industry are affected by the various regulatory requirements, which impose a disproportionate burden on small firms that are less able to afford capital expenditure requirements. One major OSHA regulation that exemplifies its affect on the textile industry is the recently mandated standard to control workplace exposure to cotton dust. Inhalation of cotton dust allegedly causes byssinosis, which afflicts some textile workers. Basically, the cotton dust standard sets maximum allowable exposure levels of cotton dust in textile plants, which requires substantial engineering controls. Other requirements include:

- o Monitoring of all employees.
- o Remeasurement of employee exposure every 6 months.
- o Additional monitoring "whenever there has been a production, process, or control change which may result in new or additional exposure to cotton dust."

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<sup>15</sup> Albert L. Nichols and Richard Zeckhauser, "Government Comes to the Workplace: An Assessment of OSHA," Public Interest, Fall 1977, p. 39.

<sup>16</sup> Ibid., p. 40.

<sup>17</sup> Walter Oi, "On Evaluating the Effectiveness of the OSHA Inspection Programs," manuscript (unpublished), University of Rochester, May 1975, cited in Weidenbaum, Business, Government, and the Public, p. 84.

<sup>18</sup> Weidenbaum, Business, Government, and the Public, p. 83.

- o Collection of at least one sample during each shift for each work area.
- o Institution of a specific, written schedule of compliance.
- o Each employer must institute a medical surveillance program for all employees.
- o Each company's medical surveillance program must provide a "free" examination by a physician for each employee.
- o A standardized questionnaire must be used to measure workers' symptoms of job-related illnesses.
- o Each employer must post a copy of the standard, easily accessible to workers.
- o Bilingual information is to be provided for workers whose first language is not English.
- o Employers must maintain exposure records for at least 20 years.<sup>19</sup>

Estimates of the costs of compliance with cotton dust standards range from OSHA's estimates of approximately \$826 million per year to over \$2 billion per year according to the American Textile Manufacturers Institute. There are many international substitutes for American made textile and apparel goods, and most countries do not impose cotton dust standards on their textile industries. Consequently, each 1 percent increase in the domestic price of textile goods due to regulatory costs leads to a disproportionate (greater than 1 percent) reduction in the amount of domestic textile goods demanded. Thus, since the demand for textile goods is "price elastic," a given increase in price leads to a large reduction in the share of the market going to domestic suppliers. At the same time, the reduction in consumer demand causes a reduction in the demand for labor use to produce textile goods, causing higher unemployment in the textile industry and in other related industries.

With respect to the benefits of cotton dust standards, it is evident that byssinosis is caused by cotton dust and aggravated by personal habits. However, it is not clear that the standards set are necessarily desirable; there is no evidence that the standards have reduced the incidence of byssinosis among workers.<sup>20</sup> Several researchers have found that byssinosis is caused by very small particles, not by the clumps of dust taken out of the air to meet OSHA's standards. There is also increasing evidence that

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<sup>19</sup> "OSHA's Limits on Cotton Dust," Job Safety and Health, June 1978, pp. 9-11.

<sup>20</sup> "OSHA realizes this problem as noted in the preamble to the cotton dust standards," Federal Register, June 23, 1978.

workers' personal habits, particularly cigarette smoking, may be principal factors in the contraction of the disease.

If this is true, the costs of cotton dust standards imposed on firms, workers, and consumers would far outweigh the benefits. Given these uncertainties, a number of cost-reducing alternatives to standards have been suggested. The Council on Wage and Price Stability proposed that OSHA should focus its attention on reducing the incidence of byssinosis, not cotton dust, and suggested that instead of standards, OSHA should impose fines on firms whose workers suffer from byssinosis that is shown to be related to cotton dust in workplaces.<sup>21</sup> The logic behind this proposal is that the fines will give firms an incentive to reduce the incidence of byssinosis. For example, firms could move more sensitive workers from areas where cotton dust is heavy to relatively dust-free areas; new fibers could be developed that do not have the harmful effects of cotton; workers could be required to wear respirators or other devices; new methods of cleaning cotton could be developed; and firms could shift to cottons known to contain lower amounts of dust. Perhaps the biggest advantage of this approach is that only the textile firms know the least-cost ways of protecting the health of workers -- they are the ones who deal with cotton dust on a day-to-day basis and can exploit the advantages and disadvantages of alternative technologies.

Neither of these approaches addresses the problem of identifying and eliminating the agent(s) which cause byssinosis. It is generally accepted that they brought into the textile plants in the raw cotton. However, they have not been identified and it is not known when they develop in the cotton. It follows that the application of controls, either through the cotton dust standard or a system of penalties at the textile plant, imposes costs that are nonspecific and nonproductive. The greatest long-term cost concern is workers' compensation. Current medical diagnosis cannot accurately distinguish byssinosis from chronic emphysema and bronchitis and relies to a great extent on a subjective questionnaire. The result is that compensation awards often are made for byssinosis when other chronic lung diseases are responsible. It should be pointed out as well that monitoring and medical surveillance were integral parts of an industry proposal for voluntary controls before the OSHA standard was issued.

### Environmental Regulation

During the 1970s, federal legislation substantially enlarged the role of the government in regulating the environment. The Environmental Protection Agency (EPA) was established to provide environmental policy at the national level, and now administers programs relating to air pollution, water pollution, solid waste disposal, pesticide regulation, and radiation.

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<sup>21</sup> Council on Wage and Price Stability, "Proposed Standards for Exposure to Cotton Dust," OSHA, Docket No. H-052 (June 17, 1977).

The activities of EPA center around the setting and enforcing of standards regarding environmental concerns. The EPA has several avenues of enforcement at its disposal. Upon finding a violation, it may seek voluntary compliance. If this approach fails, it may order compliance and take court action with possible penalties including fines and jail sentences.

Although it is difficult, if not impossible, to obtain accurate information on the benefits and costs of environmental regulation, some data are available. The Council on Environmental Quality (CEQ) noted a rather large improvement in air quality from 1970 to 1976;<sup>22</sup> since 1976 air quality appears to have remained unchanged despite massive expenditures on pollution control. Diminishing returns on investment in clean air appear to have inevitably set in, and some of the data provided by CEQ affirm this.

Similarly, much progress has been made in improving water quality in the U.S. in the past decade. CEQ finds that water bacteria levels have declined; there has been gradual improvement in water quality downstream of eleven cities where major municipal and industrial treatment plants began operating between 1967 and 1975; and there have been significant drops in the ocean dumping of wastes.<sup>23</sup> In summary, substantial gains were made between 1970 and 1977 in reducing air and water pollution. Additional expenditures by firms, consumers, and taxpayers, however, are likely to yield relatively small marginal benefits. Many economists and other social scientists now believe that the marginal costs of additional regulation by the EPA outweigh the marginal benefits, in some cases by a very large amount.

Complying with environmental regulations has increased both capital and operating costs in the textile industry by millions of dollars. Such costs for the 1973-1981 period are shown in Table V-1. During that time, cost steadily increased, nearly threefold in eight years. The gross annual cost of pollution abatement, which includes payments to government units, increased 138 percent from 1973 to 1978, from \$38.8 to \$92.5 million.

Other regulations, listed in Table V-2, are estimated to add about another \$400 million to the cost of environmental regulation, a severe burden on the textile industry.

In summary, environmental regulations during the past decade have imposed enormous costs on the economy in general and the textile industry in particular. Besides the explicit, measurable costs mentioned above, there are significant unmeasurable costs such as the cost of using skilled management to fulfill paperwork

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<sup>22</sup> U.S. Council on Environmental Quality, Environmental Quality (Washington, D.C.: CEQ, 1978).

<sup>23</sup> Ibid., pp. 91-117.

requirements and to negotiate with the EPA, and the cost of litigation. A major problem with many regulations is that the employer is forced to bear the burden of proving that his operations are not harmful to employees, the environment, and the consumer. Such costs impose an especially heavy burden on smaller firms, which are less able to fulfill the capital expenditure requirements of many EPA regulations, and are often forced to close down. While a single regulation in itself may not force closure, the combined cost of several regulations may have this effect. The steady decline in the number of small firms in the textile and apparel industry was documented in Section III. The U.S. Department of Labor estimated that, as of April 1978, there had been over 124 plant closings in the U.S. caused partly by increased pollution abatement costs, which had increased the unemployment rolls by approximately 22,800 workers.<sup>24</sup> As a result of plant closings, industries such as the textile industry become more concentrated, with larger proportions of total sales made by the larger firms. The increased cost of producing textiles (and other goods) as a result of environmental regulation is sure to render American producers less competitive in international competition and has contributed to the problems of the U.S. textile industry. It would seem prudent to concentrate now on reducing such severe costs.

#### Regulation of Labor Relations

Labor costs are a major component of the total cost of producing many textile and apparel items. Coupled with the lower average hourly wages of textile workers in countries such as Taiwan, Hong Kong, and South Korea, this fact explains in part why the terms of trade seem to have been altered in favor of foreign textile producers. Part of the gap between the wages of U.S. and foreign workers is caused by the enforcement of the minimum wage law, which covers many of the relatively unskilled workers seeking employment in the textile industry. It has been well established by economists that there are two main effects of the minimum wage law. First, workers with the least skills, education, experience, and seniority are priced out of the market and become unemployed if their contribution to the firm's profits is less than the legislatively mandated minimum wage. Second, the situation of those workers who are slightly more skilled or experienced is improved since they retain their jobs at a wage that is higher than the equilibrium market wage. Consequently, the average wage of the American textile workers is increased which places upward pressure on production costs and on the domestic prices of textiles, contributing to the relative trade disadvantage.

There are numerous other regulations enforced by the U.S. Department of Labor and the Equal Employment Opportunity Commis-

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<sup>24</sup> U.S. Department of Labor, Bureau of Labor Statistics News, June 12, 1978.

Table V-1  
Textile Industry Pollution Abatement Capital and Operating Costs, by Year, 1973-1978  
(millions of dollars)

Year	Total New Capital Expenditures	Pollution Abatement Capital Expenditures			Waste	Total	Pollution Abatement Gross Annual Costs		
		Air	Water	Total			Air	Water	Waste
1973	\$ 1,120.9	\$ 10.3	\$ 17.7	\$ 1.2	\$ 38.8	\$ 6.3	\$ 23.5	\$ 9.0	
1974	1,171.7	12.7	17.7	1.7	54.0	9.4	31.3	13.3	
1975	996.7	19.7	22.2	1.1	50.7	9.4	29.4	12.0	
1976	1,087.4	9.2	42.6	1.6	65.3	9.2	41.8	14.3	
1977	1,223.5	20.7	14.7	1.4	75.6	11.0	46.8	17.9	
1978	1,330.3	42.7	15.4	1.6	92.5	19.0	51.6	21.9	
1979	1,550.0	40	20	---					
1980	1,620.0	50	20	---					
1981	1,720.0	50	30	---					
(proj.)									
Total	\$74,145	\$255.3	\$200.3	\$8.6	\$376.9	\$64.3	\$224.4	\$88.4	

Source: Data for 1973-1978 are from U.S. Bureau of the Census, Department of Commerce, Current Industrial Reports, 1979. Data for 1979-1981 are from Bureau of Economic Analysis, BEA81-40, Department of Commerce, June 1981.

Table V-2  
 Cost Estimates of Selected EPA Regulations

Regulation	Description	Estimated Capital Cost
Effluent Guidelines for Textile Mills <sup>1</sup>	Establishes performance standards for textile mill effluent.	\$301 million (\$32 million operating cost)
Hazardous Waste Regulation	Materials "sometimes discarded" are subject to regulation. OSHA, DOT, TOSCA already perform this function.	\$ 12.5 million
Superfund Regulations	Reporting requirements for release of hazardous wastes.	\$ 4 million (operating cost)
Emission Controls for Industrial Boilers	Sets new source performance standards for industrial boilers. <sup>2</sup>	\$ 30-50 million
Toxic Substance Control	Supply of chemicals used by the textile industry is curtailed.	\$ .4 to .8 million per substance tested
Consolidated Permit Regulations	Granting of discharge permits for air, water and solid waste disposal.	\$ 2.5 million

<sup>1</sup>These estimates are for achieving BATEA under proposed revisions to efficient guidelines -- do not include costs from 72-82 for BPT.

<sup>2</sup>NPS for industrial boilers have not yet been established. The emission controls currently being enforced for industrial boilers are to meet PSD requirements.

Source: American Textile Manufacturers Institute.

sion (EEOC) which have an adverse impact on the competitiveness of the U.S. textile industry. For example, the Civil Rights Act of 1964 provides for the EEOC to investigate charges of discrimination. The Commission consistently accepts the complaints without making a preliminary determination of whether reasonable cause exists as a basis for the charges. In a rather flagrant example, the newly appointed head of the EEOC discovered that several of his staff were actually pursuing a case where individuals whose ancestors were from Transylvania claimed to be discriminated against because they were vampires!<sup>25</sup> Few cases are as absurd as this one, but such activities exemplify the zeal with which EEOC regulations have been implemented. The hundreds of hours of litigation and paperwork thus imposed upon the textile industry by the Department of Labor and the EEOC cause severe burdens with little benefit. The higher production costs caused by the regulation of labor relations tend to raise the domestic price of textile and apparel goods even further relative to the prices of foreign suppliers and are likely to be a major cause of increased unemployment, especially among the least skilled, least educated workers, and of the general decline of the industry.

Job safety, environmental, and labor relations regulation has increased the cost of producing textile and apparel goods by the billions of dollars per year now required to meet various standards. It would seem that the rather slow increase in the industry's assets discussed in Section III overstates the health of the industry, as much of that increase over the past decade has been due to investment in capital goods required to meet regulatory standards, not to produce textile goods.

#### Foreign Governments and the Supply of Textile Imports

Another major reason for the competitive difficulties of the U.S. textile industry is that many foreign governments subsidize their textile industries, directly and indirectly, while at the same time limiting American imports with various quotas, tariffs, and other barriers. For example, the Spanish government recently granted \$1.42 billion in aid to its textile industry,<sup>26</sup> and India recently agreed to subsidize 10 to 15 percent of the cost of producing blended and mixed textile items.<sup>27</sup> Other countries throughout the world provide direct subsidies to their textile industries as well as numerous indirect forms of aid. Such subsidies reduce the price of textiles relative to American made textile products, which exacerbates the problems facing American industry. The case of Japan exemplifies how heavily some of the major competitors of the U.S. textile industry are subsidized by their governments.

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<sup>25</sup> Spencer Rich, "Balancing Jobs and Affirmative Action," Washington Post, October 16, 1981, p. A-27.

<sup>26</sup> The Wall Street Journal, September 23, 1981.

<sup>27</sup> "10-15% Cash Aid for Blended Textiles," The Economic Times, Bombay, January 3, 1980.

From the early 1950s through 1964, the Japanese government provided direct subsidies to exporting industries, including textiles.<sup>28</sup> The massive foreign aid given to Japan after World War II is sure to have enhanced Japan's ability to subsidize its textile industry to the detriment of its American competitors. In 1964, however, in order to be accepted by the GATT, Japan had to alter its policies; direct subsidies were halted in favor of indirect subsidies. For example, the new program permitted 50 percent write-offs of investments in the first year; it allowed large tax-free reserves to be established; successful exporters received accelerated depreciation and tax deferrals; some direct subsidies were continued; and loans to finance the export of textiles and other selected goods were made at subsidized interest rates.

This system was altered somewhat in 1972 as a result of international pressures on Japan, but the current system is not markedly different. The government continues to subsidize the industry's research and development efforts; tax credits remain; textile firms are exempt from anti-trust laws; and various tax and depreciation advantages remain, as do low-interest loans. In addition to subsidizing its own textile industry, Japan also has a long history of tariffs, quotas, and other financial disincentives, which limit competition from imports. Japan, of course, is not an exception, but rather a characterization of the approach taken by many "democratic" countries toward industry. Even Hong Kong, which enjoys the reputation of being a mecca of private enterprise, is experiencing a rapid growth in government intervention in its economy, including the textile industry. Government spending as a proportion of Gross Domestic Product in Hong Kong has increased from 12 percent in 1970 to 22 percent in 1981.<sup>29</sup>

As mentioned above, the U.S. government has given financial support to the industrial development of Japan, and, as shown in Table V-3, of Taiwan and South Korea as well. These countries have received at least \$12 billion in direct grants since the end of World War II. In addition, other types of aid to these and other countries are granted through the Foreign Assistance Act as well as through the United Nations, which is financed heavily by U.S. contributions.

From the late 1940s to the 1960s, there was obviously widespread public support for such aid. However, as American industry has become less competitive in international trade, the various implicit costs of foreign aid have become more apparent. The billions of dollars of foreign aid to Taiwan and South Korea have freed resources to be used to subsidize such sectors of their

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<sup>28</sup> The following discussion of Japan is based on American Textile Manufacturers Institute, "Export Incentives," June 8, 1981.

<sup>29</sup> "What Would Milton Friedman Say?" World Business Weekly, April 6, 1981, p. 23.

Table V-3  
 U.S. Government Foreign Grants and Credits to  
 Taiwan and South Korea: 1945-1979  
 (millions of dollars)

Year	Tawain	South Korea
1963-79	\$1,122	\$4,097
July 1945- Dec. 1962	1,949	3,309
1963	76	240
1964	45	158
1965	49	176
1966	30	168
1967	38	193
1968	32	191
1969	12	256
1970	14	198
1971	14	194
1972	26	221
1973	39	214
1974	119	63
1975	191	314
1976	145	344
1977	69	250
1978	52	698
1979	171	228

Source: U.S. Department of Commerce, Bureau of the Census, Statistical Abstract of the U.S., various years.

Table V-4  
U.S. Military Assistance Deliveries to East Asian Governments:  
1960-79  
(millions of dollars)

	1979	1970-79	1960-69
Taiwan	\$ .5	\$ 165.2	\$ 856.1
Japan	---	---	313.0
South Korea	18.1	2,085.6	1,997.1
Indonesia	6.7	94.4	47.6
Philippines	6.5	121.4	200.4
Thailand	6.6	443.7	435.6
Total	\$38.4	\$2,910.3	\$3,849.8

Source: U.S. Department of Commerce, Bureau of the Census, Statistical Abstract of the U.S., various years.

economies as the textile industry. Political leaders in Japan, for instance, have found subsidies to the textile industries (and others) to be very popular because they are a means of obtaining political support from various groups while dispersing the costs among the general population in the form of higher taxes. Such subsidies can be expected to continue as long as the political benefits (support from the subsidized group) outweigh the political costs (taxpayer opposition). Foreign aid serves as a means of reducing or eliminating the political costs, by shifting them to the U.S. These trade-offs are especially clear on considering military aid from the U.S. as well as domestic aid. Direct military aid to Taiwan, South Korea, and other East Asian suppliers of textile imports alone is shown in Table V-4 to have exceeded \$38 billion from 1970 to 1979. Besides direct military aid, the U.S. provides nearly all of Japan's defense capabilities, with 46,000 soldiers stationed there as well as 39,000 stationed in South Korea, 1,000 in Taiwan, and 14,000 in the Philippines.<sup>30</sup> The annual wage bill alone of maintaining these forces amounts to approximately \$1.16 billion. If other costs of maintaining these forces are considered, the total annual costs are sure to be several billion dollars annually.

In sum, foreign governments are heavily subsidizing their domestic textile industries while at the same time limiting

<sup>30</sup> U.S. Department of Commerce, Bureau of the Census, Statistical Abstract of the U.S. (Washington, D.C.: U.S. Department of Commerce), various volumes.

imports from the U.S. The federal government, in providing domestic and military aid to these countries, is indirectly subsidizing their industries at the expense of many domestic industries involved directly or indirectly with the textile industry and in the process has disadvantaged the U.S. textile industry.

### Foreign Nontariff Barriers to U.S. Efforts

Many foreign government also impose nontariff trade barriers on imports from the U.S. Thus, it appears that even though American producers may have a comparative advantage in the production of many types of textiles and apparel goods, they are not permitted to take advantage of the benefits of free international trade. A U.S. Department of Commerce study has identified restrictions and requirements of 137 countries which may affect U.S. textile and apparel export sales. The trade restrictions include regulations such as embargoes, quotas, licensing requirements, prior authorization, border taxes, labeling requirements, and flammability standards. A list of such restrictions imposed by South Korea, Taiwan, and China is shown in Table V-5.

In summary, foreign governments are heavily subsidizing their own textile industries, which is a disadvantage for American firms competing in the U.S. market, while simultaneously subjecting American producers to various entry barriers to international markets. Consequently, the full welfare gains of free international trade are not being realized, and such trade restrictions put American textile manufacturers at a further competitive disadvantage.

Table V-5  
Restrictions on Imports  
Korea, Taiwan, and China in 1981

Type of Restriction	Explanation
<u>REPUBLIC OF KOREA</u>	
RESTRICTED: Certain items in CCCN categories 5003, 5101, 5311, 5601, 5602, 5604, 5605, 5606, 5903, 5908, 6004 and 6103. All items in 5002, 5009, 5103, 5312, 5801, 5802, 5804, 6001, 6005, 6006, 6102, 6104, 6107, 6109 and 6201	Since July 25, 1967, Korea has had an import plan based on a negative list (Restricted List) of items whose import license must be approved by the appropriate ministry or trade association. Within the Restricted List, certain items are specifically banned. Others are "subject to regulations to be announced separately." Essentially this involves a further set of implementation orders (not all have been issued yet which, in effect, places a de facto ban on imports) in which the MCI gives further details on eligibility or del-

Table V-5 (continued)

Type of Restriction	Explanation
<u>REPUBLIC OF KOREA CONTINUED</u>	
Licenses are valid for six months from date of issue	egates approval authority to manufacturers associations. The manufacturers association certifies that a given import license application involves a product or products not produced or producible locally.
<u>EMERGENCY DUTY:</u> The government is empowered to impose additional duties of up to 50 percent of the dutiable value of imports, if necessary, to curb imports in order to protect major domestic industries. Under this system, the tariff rates of the following textile products are increased by 20 percentage points until the end of 1981:	
<u>CCCN No.</u>	<u>Item Description</u>
5801, and 5802	Carpet, carpeting and rugs
5810	Embroidery, in the piece, in strips or in motifs
6106	Shawls, scarves, mufflers
6107	Neckties
6202	Linen-curtains, bed linen, table linen, etc.
<u>SPECIAL CHARGE:</u> 0.45% of c.i.f. value	Contributed to KTA for Export Promotion Fund
<u>NATIONAL DEFENSE TAX:</u> 2.5% of c.i.f. value, effective until end of 1985	
<u>VALUE ADDED TAX:</u> 10% of (c.i.f. value + customs duty + Special Consumption Tax)	Replaced commodity tax effective July 1, 1977
<u>SPECIAL CONSUMPTION TAX:</u> Woolen and worsted yarn and fabrics, including knitted fabrics:	

Table V-5 (continued)

Type of Restriction	Explanation
Worsted yarn and fabrics: 20% of c.i.f. value	
Woolen yarn and fabrics; 10% of c.i.f. value	
Carpets, carpeting and rugs: 30% of c.i.f. value	
<u>PRIOR APPROVAL</u> ; Required for certain items in CCN categories 5002, 5004, 5009, 5101, 5311, 5601, 5604, 5605, 5804, 5903 and 6001 even if item is used by Korean export industry	In principle, items which are raw materials to be used by Korea's export industry are <u>not</u> subject to restrictions. The items listed at left, however, constitute an exception and are subject to prior approval by the appropriate trade association
<u>PRIOR DEPOSIT</u> ; 20% of f.o.b. value plus 10% for all imports of other textile/apparel goods, except 10% for raw materials for exports. These deposit rates apply only to imports with deferred payments (usance L/C, D/A and O/P). At sight L/C do not require prior deposits. Due with license application or when license approved. Deposit returned at settlement	
<u>TAIWAN</u>	
<u>IMPORT LICENSING</u> : All products at present but some textiles likely to be exempted beginning in July 1981	Some finished textile and apparel products have been placed on "area restrictions," i.e., importable only from U.S. or Europe
Import permits are only granted to manufacturing firms, not to trading companies or brokers for the following categories: raw silk; silk yarns for processing; yarns of artificial fibers such as continuous polyamide; polyesters and polyvinyl chloride, polypropylene; old clothing and textile waste	
<u>HARBOR TAX</u> : 4% levied on dutiable value of 1.15 C.I.F.	

Table V-5 (continued)

Type of Restriction	Explanation
<p><u>IMPORT DUTIES:</u> These are ad valorem except for fabrics ready for garment-making, which are subject to taxation on specific duty</p>	<p>Duties are rebated where textile goods are used as raw materials in the manufacture of taxable products for export</p>
<p>For textiles subject to ad valorem duties, the maximum rate is 100% with an average rate of 51.42% for imports from countries or areas in general, and 49.44% for imports from countries or areas having tariff preferential treatment with Taiwan. The tariff rates are highest for finished textile and apparel products while duty free is granted for raw materials</p>	
<p>For fabrics subject to specific duties, the charge ranges from U.S. \$1.25 to \$21.39 per square meter, with a simple average of U.S. \$3.84</p>	
<p><u>SALES TAX:</u> Varies according to locality</p>	
<p><u>CHINA</u></p>	
<p><u>TARIFFS:</u> China has a two-column tariff structure with the lower tariff applied to trade with which China has concluded agreement for mutual most favored nation treatment</p>	<p>Foreign trade is conducted by the state through foreign trade corporations subordinate to the Ministry of Foreign Trade, the individual ministries, and some provincial and municipal governments</p>
<p>Source: U.S. Department of Commerce, International Trade Administration, <u>Foreign Regulations Affecting U.S. Textile/Apparel Exports</u> (Washington, D.C.: Department of Commerce, August 1981).</p>	

## VI SUMMARY AND POLICY ALTERNATIVES

The conclusions that may be drawn from this study are straightforward and may be stated simply. The fiber/textile/apparel complex plays a major role in the nation's economy. Directly or indirectly, millions of jobs depend upon it. Employment is provided for hundreds of thousands of low-skilled minority and female workers whose employment alternatives are severely limited. The economic decline of this industry not only exacerbates unemployment, but increases U.S. dependence on foreign sources of apparel and other textile products essential to industry and government, including the military. As demonstrated during World War II, dependence on distant suppliers for products essential to human and economic survival can be hazardous. A substantial reduction in the size or output capacity of the textile industry erodes the nation's economic base and produces the potential for economic and strategic disruption in the event of military crisis.

The statistical evidence indicates that the industry is experiencing severe difficulties, despite growing demand for textile products. Employment is shrinking, the number of firms has decreased over time, rates of return are low which discourages the entry of new firms, and the assets or economic resources devoted to the production of textiles have stagnated. American producers have been displaced by foreign firms as imports have rapidly captured an increasing share of the domestic markets. American manufacturers in many cases cannot effectively compete under current conditions with foreign producers, often located in newly industrialized countries such as Taiwan, Hong Kong, and South Korea.

There is convincing evidence that the regulatory policies of the federal government have played a major role in reducing the competitiveness of U.S. textile firms relative to foreign firms. The costs of domestic production have been increased through myriad regulations on worker safety, air and water pollution, and the labor market. Pollution control regulations alone have forced textile firms to invest billions of dollars in capital equipment and to incur substantial operating costs. Although the government has imposed a heavy cost burden on the industry (and especially on the small producer), expenditures dictated by such regulations seldom contribute to the efficiency or capacity of production.

At the same time that the U.S. government has clearly impeded the relative competitiveness of domestic firms it has, explicitly and implicitly, aided foreign producers through grants and aid to less developed countries to build up their industrial bases and economies. Even though the aid might not have been specifically targeted toward the textile sector, textile firms have benefited indirectly from lower capital costs. In other cases (e.g., South Korea, Japan, and Taiwan), the U.S. taxpayer has for years assumed a major burden for defense; in these instances, the domestic economy does not have to make "guns vs. butter" trade-offs --

and, again, the textile industry in such countries receives an indirect or implicit subsidy.

There is also ample evidence that foreign governments directly subsidize their own textile industries through outright grants, export subsidies, and low-interest loans. It is hardly surprising that American textile manufacturers are losing domestic markets as the U.S. government saddles them with costly regulations (that do not exist for foreign firms) and provides economic and military aid to foreign nations that, at least implicitly, benefit their textile industries. The subsidization of foreign producers by their own governments merely widens their competitive edge over American producers. These observations apply equally well to such other American industries as autos and steel that are suffering from foreign competition.

Much can be said in favor of free trade among nations, at least in theory. In reality, free trade is a panacea for economic problems that is preached far more than it is practiced. Each nation favors free trade for products that can be produced domestically at a comparative advantage and, all too frequently, opposes free trade for those products that cannot. Japan, for example, favors free export trade in autos, but strictly limits importation of American citrus fruits. When a nation has a domestic industry, importing foreign goods can result in importing unemployment and a decline in the economic infrastructure. Political, economic, and social constraints make free trade very difficult to achieve in the U.S. or elsewhere, simply because so much is at stake. In contrast, economic theorizing is not only relatively costless, but also essentially harmless.

Possible policy alternatives involve complex issues and difficult decisions. The ideal solution is for free trade to prevail throughout the world. Under current conditions, however, free trade in textiles would result in a flood of apparel imports that could severely and adversely affect an industry that is already experiencing serious economic difficulties. If U.S. firms were free from burdensome and costly government regulation, if the U.S. government (and foreign governments) ceased to subsidize foreign competitors, and if foreign governments halted subsidies to their own industries and withdrew restrictions on imports, free trade would be desirable and the most efficient way to provide goods and services to the nation's citizens. However, none of these conditions is likely to be met in any significant way. Regardless of the questionable cost-effectiveness of many regulations, it is widely perceived that elimination of many of them would be tantamount to "turning back the clock" and, therefore, politically difficult, if not impossible. U.S. aid to foreign governments, whether economic or military, direct or indirect, is and long has been perceived to be in the national economic or strategic interests. Foreign governments would also likely encounter insurmountable political resistance to major changes in longstanding trade and economic policies. Given these practical considerations, free trade in textiles (or in other

goods) would virtually assure the long-term decline of American industry, for American manufacturers would be forced to compete while hampered by severe economic disadvantages imposed by U.S. and foreign governments.

Even under the current Multifiber Arrangement which limits the rate of growth of textile imports, the U.S. textile industry will continue to experience serious problems unless the import growth rate is at or below the rate of the domestic market. Rational import policymaking is totally involved with the numerous complexities discussed here. They are not only a statement of the problems in the U.S. textile industry but an integral part of any solution. Policymakers must be informed, and policy formed, by these complex trade-off possibilities.

James T. Bennett  
and  
Thomas J. DiLorenzo

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James T. Bennett is Professor of Economics at George Mason University and an Adjunct Scholar of The Heritage Foundation.

Thomas J. DiLorenzo is Assistant Professor of Economics at George Mason University.