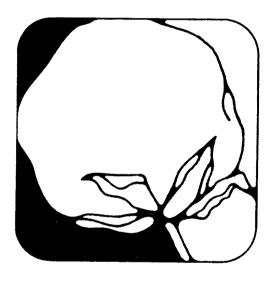
COTTON Situation



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Cotton Situation at a Glance

Item	Unit	1969		1970		19	71'
		Dec.	Jan.	Feb.	Dec.	Jan.	Feb.
GENERAL ECONOMY			1				
BLS wholesale price indices All commodities	1967=100 do.	108.5 105.3	109.3 105.5	109.7 105.5	111.0 107.9	111.8 108.3	112.8 108.2
Indices of industrial production ² Overall including utilities	do. do.			ot available ot available			
Personal income payments ²	Bil. dol.	774.3	777.8	781.5	817.5	825.4	
Retail apparel sales 2	Mil. dol.	1,681	1,616	1,735			
COTTON							
Broadwoven goods industry Average gross hourly earnings Ratio of stocks to unfilled orders ²	Dollars Percent	2.42 42	2.42 43	2.42 45	2.54 38	2.53 37	
Consumption of all kinds by mills Total (4-week period except as noted) Cumulative since August 1 Daily rate	1,000 bales do.	³ 717 3,435	635 4 , 071	626 4,697	³722 3,349	644 3,993	663 4,656
Seasonally adjusted Unadjusted Unadjusted Spindles in place on cotton system Consuming 100 percent cotton Consuming blends	do. do. Thousands do. do.	30.9 28.7 20,133 12,440 5,068	30.9 31.8 20,206 12,378 5,116	30.2 31.3 20,113 12,213 5,178	31.2 28.9 19,559 11,649 4,989	31.3 32.2 19,500 11,645 5,027	32 0 33 2 19,476 11,625 5,036
Mill margin data, expanded series Average gray goods price Average cotton price Margin	Cents do. do.	68.87 24.95 43.92	68.90 24.98 43.92	68.88 25.02 43.86	69.84 25.86 43.98	70.12 26.18 43.94	70.48 20.77 43 71
Prices of American upland Received by farmers (mid-month) Parity (effective following month) Farm as percentage of parity	do. do. Percent	19.95 48.31 41	19.09 48.18 40	20.73 48.56 42	20.96 49.82 42	21.00 50.35 42	21 47 50 86 42
Stocks Mill, end of month Public storage and compresses	1,000 bales do.	1,281.8 9,660.2	1,344.2 8,839.4	1,469.1 7,989.4	1,157.3 9,261.5	1,307.5 8,131.6	1,479.9 6,921 2
Trade Raw cotton Exports Total	do.	176.1	382.3	324.6	362.1	441.2	
Cumulative since August 1	do.	753.7	1,136.0	1,460.6	967.4	1,408.6	
Total Cumulative since August 1 Textile manufactures (equivalent raw cotton) Exports	Bales do.	966 25,195	3,187 28,381	7,517 35,899	499 10,479	3,413 13,892	
Total	1,000 bales do.	48.2 220.3	40.1 260.3	35.9 296.3	30.7 157.8	31.0 188.8	
Total	do. do.	73.7 411.9	93.4 505.3	82.9 588.2	68.6 382.5	79.7 462.2	
MAN MADE FIBERS							
Consumption, daily rate by mills ⁶ Non-cellulosics Rayon and acetate Prices	1,000 pounds do.	3,406 2,237	3,345 2,271	3,354 2,047	3,529 1,925	3,468 1,909	3,659 1,855
Non-cellulosic staple, 1.5 denier Acrylic Polyester Rayon viscose	Dollars do.	0.68 .61	0.68 .61	0.68	0.56 .61	0.56 .61	0.56 .61
Staple Modified, 1.5 and 3.0 denier Regular, 1.5 denier Yarn, 150 denier	do. do. do.	.38 .28 .93	.38 .28 .93	.38 .28 .93	.38 .28 .93	.38 .28 .93	38 28 .93

¹ Preliminary. ² Scasonally adjusted. ³ 5-week period. ⁴ Combined upland and extra-long staple. ⁵ End of morth. ⁶ On cotton-system spinning spindles, seasonally adjusted.

COTTON SITUATION

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SUMMARY

Farmers intend to plant about 12 million acres of upland cotton and 111,000 acres of extra-long staple cotton in 1971. For upland cotton, this is about 0.2 million more acres than indicated in the preliminary January intentions survey and compares with 1970 plantings of nearly 11.9 million.

The cotton carryover this summer will total around 4½ million bales, compared with 5¾ million last August. Although the 1970 cotton crop increased slightly to 10.1 million running bales, total use should moderately exceed the 10.8 million level of 1969/70, primarily reflecting improved export prospects.

U.S. cotton exports may gain one-fourth during 1970/71—to about $3\frac{1}{2}$ million bales. This improvement over last season's 2.8 million bales id indicated by a sharp decline in foreign Free-World cotton production and reduced stocks along with slightly higher consumption. Output in these countries may fall $2\frac{1}{2}$ million bales from the 1969/70 level as both acreage and yields are down in many areas.

U.S. cotton mill use during 1970/71 will match or slightly exceed last season's 8 million bales. Consumption has increased above year-earlier levels during recent months and may trend higher during the remainder of 1970/71. In contrast, use of total man-made staple fiber on cotton-system spindles, which had increased in previous years, is down from last year.

Cotton's share of the U.S. fiber market in calendar 1970 remained near the previous year's 40 percent despite a decline in total fiber use. Total domestic fiber consumption of 10.1 billion pounds was about 2 percent below the previous 2 years. This included a net import trade balance of fiber products of nearly 0.6 billion equivalent pounds, slightly above 1969. Per capita domestic fiber use dropped below 50 pounds for the first time since 1967 as cotton, wool, and rayon and acetate use declined. Non-cellulosic per capita use gained slightly.

The 1970 cotton crop totaled 10,116,096 running bales (10,058,965 bales upland cotton) according to the preliminary ginnings report. This was slightly below the December 1 estimate and compares with 1969 ginnings of 9.9 million bales. The production gain in 1970 was limited primarily due to continued adverse growing and harvesting conditions. The staple length of ginnings averaged a little shorter than in 1969.

Spot market prices for most qualities of upland cotton strengthened during January and February after

declining from early-season levels. Thus, most prices are slightly to moderately above year-earlier levels, with the shorter staples showing the biggest increases.

The extra-long staple cotton carryover this summer may be only about two-thirds of last August's 107,000 bales as expected use is considerably above the below-average 1970 crop. Because of declining supplies, the 1971 national acreage allotment was increased by half. As a result, producers indicated March 1 intentions to plant 111,000 acres this year, 35,000 more than in 1970.

U.S. demand for cotton during the 1960's lagged behind the generally expanding market for fibers. Major factors included intensifying competition from man-made fibers, high levels of U.S. textile imports, and fluctuating cotton supplies and prices. Although cotton's share of the market will continue under pressure during the 1970's, prospects are brighter than in recent years. A growing population, higher personal incomes, and expanding cotton research and promotion may enable domestic mill use of cotton to increase moderately from the 8 million bales of 1970. Also, cotton textile imports may continue upward. (See Special Article beginning on page 13.)

OUTLOOK FOR 71/72

PLANTING INTENTIONS

Farmers indicated March 1 intentions to plant about 12 million acres of upland cotton and 111,000 acres of extra-long staple cotton in 1971. For upland cotton, this represents about 0.2 million more acres than were previously indicated in the preliminary January intentions survey and compares with 1970 upland plantings of nearly 11.9 million (table 1). If these

planting intentions materialize, 1971 planted acreage of upland cotton will exceed the national base acreage allotment by almost 4 percent. Intentions in the Southwest and West show slight to moderate gains over 1970 planted acreage. Producers in the Southeast and Delta indicate cuts of about 2 percent (table 13). Smaller intentions in the eastern half of the Cotton Belt apparently are related to increasing competition from other crops, particularly soybeans and sorghum.

Table 1.—Cotton: Acreage planted, by States, average 1964-68, annual 1969 and 1970, indicated 1971, and 1971 as a percent of 1970

[Planted acres		
States	1964-68 average	1969	19701	1971²	1971 as a Percent of 1970
	1,000 acres	1,000 acres	1,000 acres	1,000 acres	Percent
North Carolina South Carolina Georgia Tennessee Alabama Wissouri Wississippi Arkanssa Louisiana Oklahoma Texas New Mexico Arizona California Other States ³	283 413 477 429 667 303 1,222 1,066 438 498 4,950 162 305 685 41	184 350 410 420 566 312 1,225 1,090 440 500 5,175 163 311 707 29	173 346 405 425 565 310 1,235 1,120 465 525 5,252 154 276 666 26	175 350 390 400 550 310 1,260 1,070 460 530 5,371 160 298 711 26	101 101 96 94 97 100 102 96 99 101 102 104 108
United States	11,939	11,882	11,942	12,061	ļ01
American Pima ⁴ Texas	28.9 16.4 35.0 0.6	27.5 16.0 33.6 .5	26.8 15.5 33.1 .5	41.0 21.0 48.0 .7	153 135 145 140
Total	80.9	77.6	75.9	110.7	146

¹Crop Reporting Board Report of December 8, 1970. ²Indicated March 1, 1971. ³Virginia, Florida, Illinois, Kentucky, and Nevada. ⁴Included in State and United States totals. American-Egyptian prior to July 1, 1970.

Compiled from reports of the Crop Reporting Board.

COTTON LEGISLATION

The intended acreage increase for upland cotton primarily reflects the more liberal provisions of the Agricultural Act of 1970, especially the suspension of marketing quotas and penalties. Other major features of the 3-year program include:

- A national average 1971-crop price-support loan rate of 19.50 cents per pound (Middling 1-inch basis, micronaire 3.5 through 4.9), net weight basis at average location—down about 2 cents from the comparable 1970 lovel
- A guaranteed support price of 35 cents per pound or

65 percent of parity, whichever is higher, on production from the national base acreage allotment of 11.5 million acres—up from the 1970 domestic allotment of 11.1 million.

- A price support payment of 35 cents less the market price, but in no event less than 15 cents per pound—compared with 16.80 cents in 1970—and a 30 percent payment bonus for small farms.
- An annual payment limitation of \$55,000 to any producer.
- A cropland set-aside requirement of 20 percent of the farm base acreage allotment.
- An expanded cotton research and promotion program.

OUTLOOK FOR 1970/71

OVERVIEW

The outlook for the remainder of 1970/71 is for continuing strong cotton exports and possibly a slight recovery in mill use. Despite a slightly larger 1970 crop, combined mill use and exports likely will exceed production by 1 to 1½ million bales, meaning the cotton carryover this summer will be cut to around 4½ million—smallest in nearly 2 decades.

This season's cotton supply also is small. A sharp drop in the beginning carryover more than offset slightly larger production, resulting in a total supply of about 16 million bales, ½ million below 1969/70, and the smallest since 1947.

DISAPPEARANCE

Combined mill use and exports of cotton may total about 11½ million bales during 1970/71, ¾ million above last season. The gain mainly reflects improved exports, which will likely increase to about 3½ million bales from the small 1969/70 level of 2¾ million (table 14). Even though U.S. supplies are reduced, foreign supplies are down even more and cotton use abroad is expected to increase slightly.

DOMESTIC MARKET OUTLOOK

U.S. Mill Use Erasing Downtrend; Cotton's Market Share Holds Steady

Use of cotton by U.S. mills during 1970/71 will match or slightly exceed last year's level of 8 million bales, marking the first time since the mid-1960's that totton use has not declined. Also, in contrast to recent years, cotton's share of the textile market steadied in calendar 1970 as competition from man-made fibers moderated. But declining military purchases of cotton textiles and lagging general economic activity if continued will likely limit expansion in cotton use.

The daily rate of mill consumption of cotton has continued to increase slightly in recent months. The seasonally adjusted rate was 31,558 bales in February, slightly above the previous month and the year-earlier level (table 2). Use during the remainder of 1970/71 may trend higher. This is based, in part, on a higher level of unfilled orders of cotton cloth in recent months in conjunction with lower inventories. Thus, the ratio of stocks to orders, normally a reliable short-term indicator of future cotton use, trended lower during the last half of 1970 and has generally remained below the year-earlier level (table 3). As a result, a pickup in orders could soon be reflected in the rate of mill use.

Reduced supplies of some of the shorter staples may have had some impact on mill use of cotton during recent months. However, mills have generally shifted to the more abundant medium and longer staples according to mill reports. For instance, consumption of cotton stapling less than 1-inch slipped below 10 percent in recent months as these supplies held near 15 percent of the total, near last year's low level. At the same time, consumption of most medium and longer staples generally increased as percentages of total use (tables 4 and 22).

Man-made fiber competition apparently has lessened in recent months. Cotton-system spinning spindles data indicate that cotton-equivalent consumption of man-made staple fiber dropped 6 percent below year-earlier levels during the first 7 months of this crop year, while cotton use declined 1 percent. Rayon and acetate use, in particular, dropped sharply (table 5).

Cotton's share of the textile market in calendar 1970 remained near the previous year's 40 percent. Cotton mill use accounted for 3.8 billion pounds of the 9.6 billion pound textile market. The general economic slowdown and increasing textile imports held total fiber use $2\frac{1}{2}$ percent below the 1969 level. Cotton mill use declined 3 percent, compared with declines of 23

Table 2. Cotton and man-made staple fiber: Daily rate of mill consumption on cotton-system spinning spindles, unadjusted and seasonally adjusted, August 1969 to date

		Upland	cotton		Man-made staple								
	196'	9/70	1970)/71 ¹		196	9/70		1970/71				
Month	Unad-	Ad-	Unad-	Ad-		on and etate	No cellul	on- losic ²		on and etate		lon- llosic ²	
	justed justed		justed	justed	Unad- justed	Ad- justed	Unad- justed	Ad- justed	Unad- justed	Ad- justed	Unad- justed	Ad- justed	
	Bales ³	Bales ³	Bales ³	Bales ³	1,000 pounds	1,000 pounds	1,000 pounds	1,000 pounds	1,000 pounds	1,000 pounds	1,000 pounds	1,000 pounds	
August	30,997 31,255 31,913 31,851 28,314 31,355 30,874 30,724 30,330 30,022 28,817 26,274	30,330 31,318 30,923 30,893 30,544 30,501 29,772 29,373 30,059 29,035 28,363 32,041	29,271 30,038 31,262 31,623 38,537 31,792 32,726	28,641 30,098 30,322 30,702 30,784 30,926 31,558	2,580 2,644 2,638 2,552 2,098 2,298 2,160 2,206 2,150 2,100 1,967 1,678	2,525 2,592 2,517 2,426 2,237 2,271 2,047 2,127 2,187 2,045 1,955 2,121	3,419 3,416 3,385 3,391 3,076 3,372 3,435 3,411 3,375 3,449 3,386 2,954	3,365 3,389 3,290 3,398 3,406 3,345 3,206 3,332 3,235 3,297 3,504	2,027 1,946 2,013 2,006 1,806 1,932 1,952	1,976 1,906 1,921 1,909 1,925 1,909 1,855	3,314 3,243 3,373 3,447 3,187 3,496 3,747	3,217 3,278 3,454 3,529 3,468	

¹ Preliminary. ² Includes nylon, acrylic and modacrylic, polyester, and other man-made fibers. ³ Running bales.

Bureau of the Census, Current Industrial Reports, M22P Supplement, April 29, 1970, and subsequent monthly reports,

Table 3.—Cotton broadwoven goods at U.S. cotton mills: Ratio of stocks to unfilled orders, seasonally adjusted

Month ¹	1966	1967	1968	1969	1970	1971
January	0.20	0.26	0.37	0.43	0.43	0.37
February	.19	.29	.42	.43	.45	
March	.18	.32	.42	.41	.44	
April	.17	.33	.41	.39	.43	
May	.17	.37	.42	.40	.41	
June	.17	.40	.42	.39	.37	
July	.17	.41	.40	.38	.38	
August	.18	.36	.42	.40	.38	
September	.18	.37	.44	.41	.36	
October	.21	.38	.41	.42	.37	
November	.23	.34	.40	.39	.34	
December	.25	.35	.40	.42	.38	

¹ End of month.

Based on data from American Textile Manufacturers Institute, Inc.

percent for wool and 12 percent for rayon and acetate. Non-cellulosic use gained 4 percent (table 1, Special Article).

Per capita mill use of all fibers dropped almost 2 pounds last year—to 46½ pounds, the second consecutive year in which use has declined. Cotton use totaled 18.6 pounds, down from 19.4 pounds the previous year. Total man-made fiber use of 26.7 pounds was about half a pound below 1969, the first such decline in a decade (figure 1 and table 1, Special Article).

U.S. domestic fiber consumption (mill use adjusted for the raw fiber equivalent of U.S. foreign trade in textile manufactures) also declined slightly in 1970. Domestic use totaled 10.1 billion pounds, 0.2 billion

below the previous 2 years. Cotton consumption of 4.1 billion pounds was about 2½ percent below the 1969 level. On a cotton-equivalent basis—where differences in manufacturing waste and yards of fabric obtainable from a unit of fiber are considered—total domestic fiber use is considerably greater. In 1970, consumption totaled about 13.4 billion pounds, equivalent to 28 million bales of cotton, near the year-earlier level (table 2, Special Article).

Cotton textile imports also influence the quantity of cotton consumed by U.S. mills. After trending upward during most of the 1960's, imports have leveled off in recent years at close to 1 million equivalent bales annually. On a raw cotton equivalent basis, imports of cotton manufactures totaled 79,700 bales in January, near the average level of recent months. Cotton textile exports, which generally average less than half U.S. imports, also have remained stable in recent months (tables 15 and 16).

Man-made fiber textile imports, which also increase the supply of competitive products, have increased rapidly in recent years. They are now running about one-third above the year-earlier level. These imports totaled 329 million pounds in 1970, probably equivalent to about 1 million bales of cotton (tables 17 and 18).

Textile deliveries to U.S. military forces have declined sharply in recent years following a major buildup in the mid-1960's. Military use of cotton textiles, which usually comprises a substantial portion of total deliveries, has paralleled this decline. On a raw fiber equivalent basis, cotton deliveries have continued to drop during recent months and now are running about one-tenth of the year-earlier level (tables 19, 20, and 21).

Table 4.—American upland cotton: U.S. mill consumption by staple length, by month, August 1969 to date

			Mi	ill consum	ption by s	staple leng	ith			
Year and month ¹	Less than			1" and 1-1/32"		1-1/16" and 1-3/32"		r than 32"	Total	Total con- sump- tion ²
	Quan- tity	Share of total	Quan- tity	Share of total	Quan- tity	Share of total	Quan- tity	Share of total	Quan- tity	
	1,000 bales ³	Pct.	1,000 bales ³	Pct.	1,000 bales ³	Pct.	1,000 bales ³	Pct.	.1,000 bales ³	1,000 bales ³
1969/70 Aug. (4)	79.0 76.7 100.4 73.1 81.3 66.9 66.7 86.7 67.4 69.4 82.1 53.5	13.2 12.7 13.0 12.0 12.0 11.1 11.3 11.7 11.5 12.0 11.9	169.5 165.8 211.5 162.0 183.9 163.2 160.8 198.9 159.9 153.5 183.4 145.6	28.3 27.3 27.5 26.7 27.2 27.0 27.3 26.8 27.2 26.7 28.8	321.5 322.1 416.7 337.7 373.4 336.3 319.4 404.7 322.3 314.5 376.4 275.0	53.6 54.8 54.2 55.5 55.3 55.7 54.3 54.6 54.8 54.7 54.4	29.6 31.8 41.1 35.4 36.8 37.3 41.9 51.1 38.2 38.5 46.3 31.2	4.9 5.2 5.3 5.8 5.5 6.2 7.1 6.5 6.7 6.7 6.2	599.6 606.4 769.7 608.2 675.3 603.7 588.8 741.5 587.8 688.1 505.2	618.6 624.0 796.7 635.8 706.1 625.2 617.5 766.5 605.6 599.6 719.0 524.9
1970/71 Aug. (4)	59.7 74.0 56.0 56.0 65.5 58.2 60.8	10.7 10.3 9.4 9.2 9.6 9.6 9.7	154.4 196.5 167.5 166.0 193.3 173.6 173.5	27.6 27.4 28.1 27.3 28.3 28.5 27.7	309.0 402.3 335.8 352.6 389.0 345.2 357.6	55.3 56.2 56.4 58.0 57.0 56.8 57.2	35.8 43.9 36.3 33.1 35.1 31.1 34.0	6.4 6.1 6.1 5.5 5.1 5.1	558.9 716.6 595.7 607.8 682.9 608.1 625.9	584.2 749.6 624.3 631.5 712.4 634.9 653.6

Numbers in parentheses indicate number of weeks in month. Includes data for which breakdown by staple length was not obtained. Bunning bales. Preliminary.

Bureau of the Census, as reported by mills.

Table 5.—Upland cotton and man-made staple fibers¹:
Mill consumption on cotton-system spinning
spindles, by months, 1969/70 to date

spindi	es, by monti	ns, 1909/70	to date	
Year and	Cotton	Cotton ed	quivalent ma taple fibers ³	n-made
month ²		Rayon and acetate	Non- cellulosic	Total
	Bales ⁴	Bales ⁵	Bales ⁵	Bales ⁵
1969/70 August (4) September (4) October (5) November (4) December (5) January (4) February (4) March (5) April (4) May (4) June (5) July (4)	619,941 634,267 797,825 637,019 707,848 627,099 617,482 768,100 606,616 600,431 720,439 530,097	118,241 121,181 151,110 116,953 120,200 105,334 98,986 126,411 98,542 96,239 112,690 76,901	195,176 194,997 241,551 193,584 219,494 192,465 196,070 243,398 192,682 196,889 241,585 168,601	313,417 316,178 392,661 310,537 339,694 297,799 295,056 369,809 291,224 293,128 354,275 245,502
Total ⁶	7,857,998	1,342,788	2,476,492	3,819,280
1970/71 August (4) September (5) October (4) November (4) December (5) January (4) February (4)	585,416 750,943 625,241 632,455 713,426 635,842 654,510	92,916 111,467 92,260 91,971 103,441 88,534 89,723	189,177 229,224 192,531 196,738 227,400 199,555 213,880	282,093 340,691 284,791 288,709 330,841 288,089 303,603

¹ In cotton-equivalent bales. ² Numbers in parentheses indicate number of weeks in period. ³ Based on a cotton-equivalent factor of 1.10 for rayon and acetate and 1.37 for non-cellulosic. ⁴ Running bales. ⁵ Cotton equivalent of monthly consumption divided by 480. ⁶ Sum of monthly consumption not adjusted to August 1-July 31 marketing year basis. ⁷ Preliminary.

The average mill margin for cotton cloth has remained firm in recent months after trending upward since early 1970/71. Both raw cotton prices and the wholesale value of fabric produced from a pound of cotton have recently advanced. In February, the margin averaged 43.71 cents per pound, slightly below the previous month and February 1970.

Cloth values have trended up in recent months, reaching their highest level in February since the series originated almost 5 years ago. However, rising raw cotton prices offset the higher fabric values. In February, cotton prices jumped over half a cent to 26.77 cents per pound, 1% cents above the year-earlier level (table 6).

1970 Ginnings Near Previous Estimate; Staple Shorter

Preliminary ginnings indicate that the 1970 crop of all kinds of cotton totaled 10,116,096 bales (including 57,131 bales of extra-long staple cotton) (table 7). This is down only slightly from the December 1 crop estimate and compares with 1969 ginnings of 9.9 million running bales. The production gain was limited primarily due to 1970 being a second consecutive year of adverse growing and harvesting conditions. Based on the December crop

report, yields averaged 441 pounds per acre, only 2 percent above the below-average 1969 yield; harvested acreage was up 1 percent (table 13).

According to the Consumer and Marketing Service, the average staple length of preliminary ginnings was 33.4 thirty-seconds inches, down from last season's 33.6 and the record average length of 33.9 thirty-seconds inches for the 1968 crop. Almost two-thirds of ginnings stapled 1-1/16 inches and longer, near the year-earlier proportion (tables 8 and 22).

The average fiber strength of the 1970 crop was about the same as for the preceding crop. However, the grade index, at 91.5 (Middling White equals 100), was above the 91.1 achieved in 1969. Cotton "miking" in the 3.5 to 4.9 premium category also was up slightly at 84 percent of ginnings.

The 1970 cotton crop held against outstanding price support loans by the Commodity Credit Corporation totaled about 1.4 million bales as of March 19. This compares with 2.8 million bales of the 1969 crop held on approximately the same date last year. About 1.5 million bales of CCC-owned cotton have been sold this season, leaving a current inventory of around 1.7 million (including extra-long staple cotton) (tables 9 and 23).

Upland cotton farm prices have strengthened this season, averaging above year-earlier prices each month

Table 6.—U.S. price of unfinished cloth (expanded series), price of raw cotton, and mill margin

price of i	avv cotton, a	id min margin	
		Cotton fabric	:
Year and month	Fabric values ¹	Price of raw cotton ²	Mill margins ³
		Cents	
1969 August September October November December January February March April May June July Average	68.62 68.79 68.81 68.84 68.87 68.90 68.85 68.76 68.56 68.56 68.46	25.11 24.76 24.75 24.88 24.95 24.98 25.02 25.06 25.11 25.17 25.23 25.35	43.51 44.03 44.06 43.96 43.92 43.86 43.79 43.65 43.41 43.33 43.11
1970 August September October November December January February	68.47 68.81 69.12 69.48 69.84 70.12 70.48	25.49 25.52 25.59 25.52 25.86 26.18 26.77	41.98 43.29 43.53 43.96 43.98 43.94 43.71

¹Estimated value of fabric obtainable from a pound of fabric obtainable from a pound of fiber. ² Monthly average prices per pound for four territor growths, even running lots, mike 3.5-4.9, prompt shipmen delivered Group 201. Mill Points (Group B). ³ Different between fabric values and fiber prices.

Consumer and Marketing Service.

Table 7.-Cotton ginned: United States, crops of 1968, 1969, and 19701

State	1968	1969	1970²	1968	1969	1970²
	1,000	1,000	1,000	1,000	1,000	1,000
	running	running	running	500-lb.	500-lb.	500-lb.
	bales	bales	bales	bales ³	bales	bales ³
nited States	10,917	9,937	10,116	10,948	10,008	10,186
abama	402	466	514	400	468	516
	725	625	494	724	626	495
	1,033	1,141	1,041	1,034	1,147	1,050
alifornia	1,594	1,336	1,176	1,580	1,320	1,164
	10	9	8	10	9	7
	269	277	287	262	276	287
ulsiana	545	482	521	545	483	523
ississippi	1,519	1,308	1,622	1,523	1,321	1,605
	197	326	223	196	323	224
ew Mexico	165	147	129	165	148	130
	130	106	162	125	102	158
	260	271	187	265	278	192
Carolina	264	211	216	250	205	211
	323	417	386	323	420	391
	3,473	2,807	3,144	3,537	2,874	3,225
other	8	8	6	9	8	6
1						

Totals were made from unrounded data. ² Preliminary. Gross weight bales.

ne United States total for 1970 includes 6,021 bales of the rop of 1970, ginned prior to August 1 which were counted in the supply for the cotton season of 1969-70, compared with 9,784 for 1969, 6,065 for 1968, and 256,540 for 1967. Also and 256,540 for 1967, Also holded are 57,131 bales of American Pima cotton for 1970,

Table 8.-Upland cotton: Ginnings, by staple length, crops of 1969 and 1970

		Upland 9	ginnings ¹		_
Stapie	Qua	ntity	Share	of total	
	1969	19701	1969	1970 ¹	
	1,000 bales	1,000 bales	Percent	Percent	
//8" and shorter 99/32" 5/16" 11/32" -1/32" -1/16" -1/32" -1/8" -5/32" and	140.5 416.1 628.9 498.9 552.4 1,037.3 3,050.2 2,849.7 527.1	37.6 305.4 1,020.7 561.4 499.6 1,028.9 3,833.8 1,996.4 615.7	1.4 4.2 6.4 5.1 5.6 10.5 31.0 28.9 5.3	0.4 3.5 10.1 5.6 5.0 10.2 38.2 19.8 6.1	
longer	165.5	115.7	1.6	1.1	
Total	9,866.7	10,060.2	100.0	100.0	

^{Prelimina}ry. Unrevised data.

onsumer and Marketing Service.

December 1, prices averaged 22.4 cents per pound, mpared with 20.94 cents during 1969/70. The bruary price was 21.47 cents, slightly above the evious month and February 1970 (table 24).

compared with 76,838 for 1969, 78,182 for 1968, and 64,779 for 1967.

The average gross weight per bale for 1970 is 503.5 pounds compared with 503.6 for 1969 and 501.5 for 1968. The number of active cotton gins for the crop of 1970 is 3,754 compared with 3,943 for 1969 and 4,218 for 1968.

Bureau of the Census.

The support price for the 1970 crop of upland cotton (average of the crop) is 20.15 cents, almost half a cent above the previous crop. Prices received by farmers do not include the direct price support payment on domestic allotments (65 percent of the farmer's final allotment) which was 16.80 cents this season. The 1969 payment was 14.73 cents per pound.

Average spot market prices for most qualities of upland cotton strengthened during January and February after declining from early-season levels. As a result, most prices now are slightly to moderately above year-earlier levels, with the shorter staples showing the biggest increases. For instance, the average spot market price for Middling 15/16-inch cotton was 22.10 cents per pound in February, almost 2 cents above February 1970. Middling 1-1/16-inch cotton in February averaged 25.22 cents, compared with 24.90 cents last year (table 24).

Greater Plantings and Reduced Carryover Highlight ELS Outlook

Acreage planted to the 1971 crop of extra-long staple cotton will be largest since 1964, according to March 1 intentions. Producers indicated they planned to plant 111,000 acres, slightly above January intentions and about one-third above 1970 plantings (table 1). Larger acreage reflects a 50 percen' increase in the national

Table 9.—Commodity Credit Corporation stocks of cotton, United States, August 1, 1970 to date

	5-1-	Total		Upland		E	Extra-long staple	,1
	Date	। ठावा	Owned ²	Under loan	Total	Owned ³	Under Ioan	Total
					1,000 bales			
August	1	'	2,957		2,957	73		73
August	7		2,881		2,881	63		63
August	14	2,942	2,881		2,881	61		61
August	21	2,918	2,858		2,858	60	***	60
August	28	. ,	2,858		2,858	60		60
September	4	2,819	2,751	9	2,760	59	•••	59
September	11	2,826	2,751	16	2,767	59		59
September	18	1 '	2,595	19	2,614	59		59
September	25		2,595	18	2,613	59		59
October	2	2,619	2,542	20	2,562	57		57
October	9		2,542	26	2,568	57		57
October	16	1	2,419	49	2,468	57		57
October	23		2,419	89	2,508	56		56
October	30	1	2,318	157	2,475	56		56
November	6		2,318	211	2,529	55	(⁴)	55
November	13		2,242	272	2,514	55	(⁴)	55
November	20	1 '	2,242	466	2,708	54	`´2	56
November	27	1 '	2,210	641	2,851	53	3	56
December	4		2,210	845	3,055	52	4	56
December	11		2,168	982	3,150	47	7	56 54
December	18	1	2,168	1,194	3,362	47	8	55
December	25	1	2,036	1,326	3,362	47	8	55
January	1		2,036	1,434	3,470	47	11	58
January	8	1 - '	2,012	1,795	3,807	43	12	55
January	15	1 '	2,012	1,925	3,937	39	18	57
January	22	1 1/11	1,977	1,929	3,906	34	19	53
January	29	4	1,977	1,909	3,886	32	21	53
February	5		1,876	1,887	3,763	31	22	53
February	12	'	1,876	1,827	3,703	30	21	51
February	19	1 '	1,639	1,758	3,397	30	20	50
February	26		1,639	1,682	3,321	30	21	51
March	5	1 '	1,433	1,591	3,024	30	21	51
March	12	0.000	1,433	1,510	2,943	30	20	50
March	19	2,796	1,349	1,397	2,746	30	20	50

¹ Includes American Pima and Sea Island, ² Excludes cotton sold September 4 to date for delivery in the 1969 marketing year.

Agricultural Stabilization and Conservation Service.

acreage allotment-to 117,791 acres-because of rapidly dwindling supplies.

The ELS carryover this summer may total about two-thirds of last August's stocks of 107,000 bales. A much smaller carryover is likely despite slightly smaller mill use, as 1970 production fell sharply (table 14). As a result, USDA announced a "shortfall" this year of 43,000 bales, all of which has now been sold at market prices.

Smaller production-57,131 running bales, down from 76,800 last season due to lower yields—has resulted in stronger cotton prices this year. Farmers' prices for ELS cotton to December 1 averaged 44.6 cents per pound, compared with 40.5 cents a year earlier. In February, prices averaged 43.6 cents, slightly below early-season levels. The support price for the current crop is 40.5 cents, half a cent above a year earlier. Producers are eligible for a direct price support payment of 9.29 cents a pound, compared with 8.88 cents for the 1969 crop.

EXPORT MARKET OUTLOOK

Little Change in World Output and Use

Global cotton production and consumption are projected to remain near last year's levels of 51.7 and 53.2 million bales, respectively. A small gain is possible for cotton use with perhaps a slight decline in output Consumption may increase a little in communist and foreign Free-World countries, with little change likely in the United States. World cotton production could decline slightly despite record-high USSR output Sharply lower foreign Free-World prospects are responsible (table 25).

Little change also is expected from last season's world exports of 17.2 million bales. U.S. shipments may account for about one-fifth of total trade, up from 1 percent in 1969/70.

³ Includes American Pima cotton transferred to CCC from the national stockpile. 4 Less than 500 bales.

Brighter U.S. Export Prospects Reflect Smaller Competitive Supplies

U.S. cotton shipments may increase ¾ million bales this season to about 3½ million. A 2½ million-bale decline in foreign Free-World production, along with slightly higher consumption and reduced stocks, increased the demand for U.S. cotton. During August-February of the 1970/71 season, shipments totaled 1.9 million bales, up about one-fourth from the year-earlier level (table 26).

Foreign Free-World production is projected at 23.4 million bales in 1970/71, according to the Foreign Agricultural Service. This compares with last season's 25.9 million bales and the 1964-68 average of 23.9 million. Both acreage and yields are down in many countries. Brazil shows the sharpest decline. Its production prospects are almost 1 million bales below 1969/70. Significantly smaller output also is likely in Mexico, India, Nigeria, and the United Arab Republic (tables 10 and 25). Major factors include poor growing conditions, a tight credit supply, and farmers' disappointment with returns from last season's cotton crops.

Foreign Free-World consumption has trended steadily upward in recent years and a further slight increase is expected this season. Use may total about 27.3 million bales, fractionally above 1969/70, and a little over 1 million above the 1964-68 average (table 10). As in the United States, man-made fiber competition is limiting gains in cotton use abroad.

Because of declining output, the gap between foreign Free-World production and consumption is widening

substantially during 1970/71. The difference may increase to about 4 million bales, triple the year-earlier deficit, and the greatest in a decade (table 10).

Funds Available for Government Export Financing

Through mid-March, funds available for financing U.S. cotton exports under special government programs (including authorizations and loans issued but not used in previous years and those which may not be used in fiscal 1971) would cover shipments of around 1½ million bales. Currently available authorizations under P.L. 480 for financing cotton exports during 1970/71 are below last year's total, while Export-Import Bank credits issued are about the same (table 11).

Prices Strengthen in Import Markets

Prices for most qualities of U.S. and foreign-grown cotton, c.i.f. Liverpool, have increased during the past year and now exceed year-earlier levels by 2 to 3 cents per pound in most instances. Recent prices for U.S.-grown cotton generally have averaged near those of competitive growths (tables 12 and 27).

U.S. Strict Middling 1-1/16-inch cotton prices averaged 31.52 cents per pound in February, about half a cent above the previous month and almost 3 cents above February 1970. The U.S. price was slightly above the c.i.f. Liverpool index for similar qualities in February (table 12).

U.S. and foreign average spot export prices are shown in table 29.

Table 10.- Cotton: Supply and distribution in the foreign Free World, 1959-70

Item	Year beginning August 1											
	1959	1960	1961	1962	1963	1964	1965	1966	1967	1968	1969²	1970 ³
		**				Million	n bales		-	•		
tarting carryover ¹	8.9 16.6	9.0 19.0	9.9 19.5	9.3 21.9	9.5 22.0	10.0 22.9	10.4 23.6	10.4 22.8	10.9 23.9	12.2 26.0	13.1 25.9	12.8 23.4
States	7.1	6.4	4.8	3.2	5.5	4.0	2.9	4.6	4.1	2.6	2.7	3.4
Total	32.6	34.4	34.2	34.4	37.0	36.9	36.9	37.8	38.9	40.8	41.7	39.6
onsumption xports to United States, net exports to communist countries, and	22.2	23.4	23.6	23.4	24.5	25.0	25.0	25.5	25.7	26.5	27.2	27.3
destroyed	1.4	1.1	1.3	1.5	2.5	1.5	1.5	1.4	1.0	1.2	1.7	1.0
Total	23.6	24.5	24.9	24.9	27.0	26.5	26.5	26.9	26.7	27.7	28.9	28.3
nding carryover ¹	9.0	9.9	9.3	9.5	10.0	10.4	10.4	10.9	12.2	13.1	12.8	11.3

Includes cotton afloat, in transit, and in free ports. ² Preliminary. ³ Estimated.

Foreign Agricultural Service.

Table 11.—Special programs of the U.S. Government for financing cotton exports: Fiscal years 1968-71¹

	196	7/68	196	8/69	196	9/70	1970)/71 ²
Program	Value	Quan- tity	Value	Quan- tity	Value	Quan- tity	Value	Quan- tity
	Mil. dol.	Mil. bales³	Mil. dol.	Mil. bales³	Mil. dol.	Mil. bales³	Mil. dol.	Mil. bales³
Export-Import Bank ⁴ P.L. 480 sales Foreign curren-	67.4	0.6	50.1	0.4	71.1	0.6	75.0	0.6
cies Dollar credit	120.9 12.1	.9 .1	83.9 3.4	(⁵ .7	130.3 8.1	1.0 .1	86.1 1.0	.6
Total ⁶	200.3	1.6	137.5	1.1	209.6	1.7	162.1	1.3
Barter	41.9 47.9	.4 .4	30.8 46.8	0.3 .4	77.7 48.2	0.7 .4	⁷ 52.6 ⁸ 24.2	⁷ 0.4 8.2

¹ Authorized for delivery and shipment. Data may differ slightly from actual shipments due to shipping time lags. ² Preliminary. Data through March 17, 1971. ³ Running bales, partly estimated. ⁴ Includes amounts advanced by participants or disbursed by others at Export-Import Bank risk. ⁵ Less than 50,000 bales. ⁶ Totals made from unrounded data. ⁷ Data through December 31, 1970. ⁸ Data through February 26, 1971.

Estimates compiled from Agricultural Stabilization and Conservation Service and Foreign Agricultural Service reports and from Export-Import Bank reports.

Table12.—Index of prices of selected cotton growths and qualities, and price per pound of U.S. SM 1-1/16" c.i.f. Liverpool, England

	19	69	19	970	19	971
Month	Index ¹	U.S. SM 1-1/16" ²	Index ¹	U.S. SM 1-1/16'' ²	Index ¹	U.S. SM 1-1/16" ²
			Ce	ents		
January February March April May June Juny August September October November December	28.19 27.78 27.83 28.31 28.64 28.19 27.74 27.09 26.99 27.15 27.74 3 28.75	29.01 28.79 28.60 28.60 28.49 28.13 28.00 28.00 28.05 28.75	28.19 28.08 28.19 28.38 28.50 28.58 28.84 29.32 29.66 30.20 30.68	28.75 28.81 29.00 29.31 29.40 29.45 29.70 29.75 30.26 30.70 30.58 30.39	30.91 31.15	30.95 31.52
Average	27.82	28.47	28.93	29.68		

 $^{^1}$ Average of the 6 cheapest growth of SM 1-1/16 inch cotton activity traded for the period in Liverpool market. 2 Based on offers of minimum micronaire of 3.5 to 4.9. 3 Average of 3 quotations.

Compiled from Foreign Agriculture Service records and the weekly *Cotton and General Economic Review*, Liverpool, England.

U.S. DEMAND FOR COTTON: TRENDS AND PROSPECTS 1

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ABSTRACT: Demand for cotton by U.S. mills declined during the 1960's as competition from man-made fibers intensified. Use of 8 million bales in 1970 was only slightly below the 1960 level, but cotton's share of the market, at 40 percent, was down substantially from a decade ago. In addition to suffering competitive losses from man-made fibers, U.S. cotton encountered increasing levels of textile imports and fluctuating supplies and prices of cotton during most of the decade. However, prospects for use are brighter than in recent years. An increasing population and higher incomes as well as expanding cotton research and promotion may stimulate mill use to 8½ to 9 million bales, compared with 8 million in 1970. Larger mill use together with increasing cotton textile imports could mean a total U.S. market for cotton goods of about 10 million bales in 1980, compared with 8½ million at present.

KEY WORDS: Cotton, fiber demand, domestic use, inter-fiber competiition, 1980 prospects.

INTRODUCTION

Cotton consumption in the 1960's contrasted sharply with the generally expanding U.S. market for fibers. Although mill use of 8 million bales in 1970 was only slightly below the 1960 level, cotton's share of the market, at 40 percent, fell substantially. Factors contributing to smaller cotton use during recent years include intensifying competition from man-made fibers, high levels of U.S. textile imports, smaller military use, and fluctuating cotton supplies and prices. Also, lagging general economic growth during the past 2 years has hurt cotton use.

However, these adverse factors have been partially offset by an expanding population, higher consumer incomes, more research and improved cotton products, and increasing promotion efforts.

This article examines the impact of these factors on consumer cotton demand for major apparel, household, and industrial end uses, and the derived demand by mills. Also, cotton and other fiber prospects for the 1970's are analyzed.

RAW COTTON DEMAND

MILL CONSUMPTION

Impact of Man-made Fibers

Consumption of cotton by U.S. mills totaled nearly 4 billion pounds in 1970, down less than a tenth from 1960. However, per capita use dropped about a fifth. Since total per capita fiber use rose during the 1960's, cotton's share of the textile market declined sharply. This was in contrast to rising use of man-made fibers (figure 1 and table 1). On a per capita basis, use of rayon and acetate and non-cellulosic fibers during the 1960's increased at an average annual rate of 3.1 percent and 18.6 percent, respectively, while cotton use trended downward by 1.1 percent.

Textile Trade Cuts Into U.S. Mill Use

Larger imports of cotton textiles also appeared to cut into U.S. mill consumption of cotton during 1960-70. Imports averaged the equivalent of around 1 million

¹This article is the third in a series on the domestic cotton industry's structure and the supply and demand for raw cotton. The first article, "The Cotton Fiber-Textile- Apparel Complex: Structure and Outlook for the 1970's," was published in the May 1970 Cotton Situation, CS-246; the second article, "Yield and Acreage Implications for U.S. Cotton," appeared in the August 1970 Cotton Situation, CS-247.

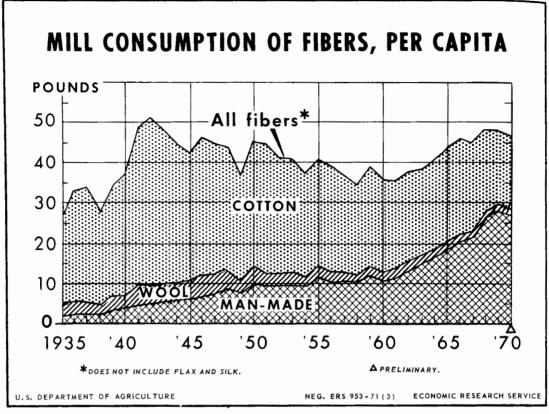


Figure 1

bales of cotton a year during the late 1960's, about double the 1960 level. These imports probably displaced significant quantities of domestically produced cotton products, thereby reducing demand for raw cotton by U.S. mills. For example, 1970 imports accounted for about 12 percent of the total domestic market for cotton, up from 6 percent in 1960.

Cotton textile imports increased despite the Long-Term Textile Agreement. Under this 1962 agreement, U.S. imports of cotton textiles may be restricted when domestic markets are threatened or subjected to disruption. However, certain provisions, such as a 5-percent annual growth factor and reciprocal agreements, provide for increasing levels of imports. Since 1960, cotton textile imports have increased at an average annual rate of 10 percent.

A relatively low and declining level of U.S. cotton textile exports also has hampered domestic mill output of cotton goods. Textile exports were equivalent to about 0.4 million bales of cotton in 1970, down from about 0.5 million in 1960.

Larger imports of man-made fiber manufactures also had an adverse effect on domestic mill use of cotton in recent years by increasing the supply of competitive fabrics. These imports jumped from 31 million equivalent pounds of raw fiber in 1960 to 329 million in 1970, probably equivalent to about 1 million bales of cotton. Wearing apparel accounted for most of the increase.

DOMESTIC COTTON USE

Domestic Use Exceeds Mill Use

U.S. foreign trade in cotton textiles must be considered in measuring the quantity of cotton used by U.S. consumers. This domestic use is estimated by adding the raw fiber equivalent of imported textile manufactures to mill use of raw cotton and deducting the raw fiber equivalent of exported textile products. On this basis, domestic use has been a little higher than mill use in recent years because of an import trade balance. Since 1966, the cotton textile import balance has averaged slightly over half a million bales. Thus, 1970 per capita domestic cotton use was near 20 pounds, over 1 pound greater than mill consumption. However, per capita use still was 15 percent below 1969 (table 2).

Cotton's Market Share Drops to One-third on Cotton-Equivalent Basis

Fibers do not substitute on a pound-for-pound basis. This results from differences in waste involved in manufacturing fabric from various fibers and from differences in the yards of fabric obtainable from an equal poundage of the various fibers. Thus, when these differences are considered, a more meaningful comparison of fibers is possible.

As man-made fibers generally have higher u^{tility} factors than cotton, the conversion of fibers into

Table 1.-Mill consumption of fibers: Total and per capita, 1940-70

Year	Popula-		Cotton ²			Wool ³		Ray	on and acet	ate ⁴		on-cellulosion n-made fibe			Man-made fiber waste ⁶		All f	ibers ⁷
begin- ning Jan. 1	tion July 1 ¹	Total	Percent- age of fibers	Per capita	Total	Percent- age of fibers	Per capita	Total	Percent- age of fibers	Per capita	Total	Percent- age of fibers	Per capita	Total	Percent- age of fibers	Per capita	Total*	Per capita ⁹
	Mil.	Mıl. Ib.	Pct.	lb.	Mil. Ib.	Pct.	Lb.	Mıl. Ib.	Pct.	Lb.	Mıl. Ib.	Pct.	Lb.	Mıl. Ib.	Pct.	Lb.	Mıl. Ib.	Lb.
1940 1941	132.1 133.4	3,959.1 5,192.1	80.4 80.0	30.0 38.9	407.9 648.0	8.3 10.0	3.1 4.9	482.1 591.9	9.8 9.1	3.6 4.4	4.3 11.6	0 1 .2	(10) 0.1	12.3 14.0	0.2	0.1 .1	4,925.3 6.492.8	37.3 48.7
1942	134.9	5,633.1	81.4	41.8	603.6	8.7	4.5	620.8	9.0	4.4	23.1	.3	.2	15.0	.2	.1	6.918.8	51.3
1943	136.7	5,270.6	79.5	38.6	636.2	9.6	4.7	656.1	9.9	4.8	35 3	.5 .5	.3	21.4	.3	.2	6,633.2	48.5
1944	138.4	4,790.4	77.3	34.6	622.8	10.0	4.5	704.8	11.4	5.1	45.8	.7	.3	21.9	.4	.2	6,195.2	44.8
1945	139.9	4,515.8	75.1	32.3	645.1	10.7	4.6	769.9	12.8	5.5	49.8	.8	4	25.4	.4	.2	6,014.4	43.0
1946	141.4	4,809.1	73.7	34.0	737.5	11.3	5.2	875.5	13.4	6.2	53.2	.8	.4	25.6	.4	.2	6,527.0	46.2
1947	144.1	4,665.6	72.5	32.4	689.2	10.8	49	987.9	15.4	6.9	51.4	.8	.4	18.6	.3	.1	6,433.7	44.6
1948	146.6	4,463.5	69.7	30.4	693.1	10.8	4.7	1,149.4	17.9	7.8	71 7	1.1	.5	18.6	.3	.1	6,409.2	43.7
1949	149.2	3,839.1	70.4	25.7	500 4	9.2	3.4	994.5	18.2	6.7	92.8	1.7	.6	15.6	.3	1	5,451 5	36.5
1950	151.7	4,682.7	68.3	30.9	634.8	9.3	4.2	1,350.0	19.7	8.9	140 5	20	9	28.0	.4	.2	6,857.5	45,2
1951	154.3	4,868.6	71.1	31.6	484.2	7 1	3.1	1,274 6	18.6	8 3	195 5	2.8	1.3	8.4	.1	.1	6,849.6	44.4
1952	157.0	4,470.9	69.4	28.5	466 4	7.2	3.0	1,214.7	18.8	7.7	249.0	3.9	1.6	26.4	.4	.2	6,446.6 -	41.1
1953	159.6	4,456.1	68.7	27.9	494.0	76	3.1	1,222.5	18 9	7.7	279.3	4.3	18	21.8	.3	.1	6,489.1	40.7
1954 . 1955	162.4 165.3	4,127.3 4,382.4	68.4	25.4 26.5	384.1 413.8	6.4 6.2	2 4 2.5	1,154.7	19.1 21 1	7.1 8 6	328.6	5.4 6.4	2 0 2.6	25 0	.4	.2 .3	6,035.2	37.2
1955	168.2	4,382.4	65 <i>.</i> 2 66 6	25.9	413.8	6.7	2.5	1,419.1 1,200.8	18.3	8 6 7.1	432.2 484.1	74	2.6	51.1	.8 .7	.3	6,717.6	40.6 38.9
1957	171.3	4,362.6	65.1	23.7	368.8	5.9	2.2	1,200.8	18.3	69	567 5	91	3.3	42.4 48.0	.7	.3 .3	6,551.2 6,237.2	36.4
1958	171.3	3,866.9	64.8	22.2	331.1	5.5	19	1,177.0	18.9	6.5	575.3	9.6	3.3	61.7	1.0	.3 .4	5,971.5	34.3
1959	177.1	4,334.5	63.3	24 5	435 3	6.4	25	1,252.4	18.3	7 1	741 4	10 8	4 2	70.9	1.0	.4	6,846.3	38.7
1960	180.7	4,190.9	64.6	23.2	411.0	6.3	2.3	1,055 4	163	58	761 6	11 7	4.2	57.7	.9	3	6,488.3	35 9
1961	183.8	4,081.5	62.2	22.2	412.1	6.3	2.2	1,128.0	17 2	6 1	861 4	13.1	4 7	65 2	1.0	.4	6,560.9	35.7
1962	186.7	4,188.0	59.5	22.4	429.1	6.1	2.3	1,263 4	17.9	68	1,075 6	15 3	58	73.8	1 0	4	7,042.3	37.7
1963	189.4	4,040.2	55 8	21.3	411.7	5.7	2.2	1,440 2	19.9	7 6	1,257 5	17.3	66	77 3	1.1	4	7,240.0	38.2
1964	192.1	4,244.4	54.6	22.1	356.7	4 6	19	1,5163	19 5	7 9	1,554 8	20 0	8.1	91 1	1 2	.5	7,777.5	40.5
1965	194.6	4,477 5	52 7	23.0	387 0	4.6	2.0	1,550.4	18 2	8 0	1,961.5	23 1	10.1	102.2	1.2	.5	8,491.9	43.6
1966	196.9	4,630.5	514	23 5	370 2	4 1	19	1,591 1	17 7	8 1	2,299 1	25.5	11 7	98.8	1.1	.5	9,004.4	45.7
1967	199.1	4,423 0	49 2	22 2	312 5	3.5	16	1,500 2	16 7	75	2,620.1	29.1	13.2	124.0	14	6	8,990.2	45.1
1968	201.2	4,146.5	42 3	20.6	329 7	3 4	16	1,688 0	17 2	8 4	3,462 0	35.4	17 2	155 4	1 6	8	9,793.8	48.6
1969 .	203.2	3,932.7	40 1	19.4	312 8	3 2	1.5	1,614 9	16 5	7 9	3,798 0	38 7	18 7	136 4	1 4	7	9,804.7	48.3
1970¹	205 4	3,8148	39 9	18 6	240.4	2 5	1 2	1,413 6	14 8	6 9	3,948.6	41 3	19 2	132.7	1 4	6	9,558.0	46.5

¹ Bureau of the Census. Population continental United States as of July 1, including Armed Forces overseas ³ Mill consumption as reported by the Bureau of the Census For American cotton, tare as reported by the Crop Reporting Board has been deducted, for foreign cotton, 3 percent (15 pounds) was deducted, (20 pounds beginning August 1, 1958) Since 1950, data have been adjusted to year ended December 31 ³ Includes apparel and carpet wool on a

scoured basis Data from Wool Consumption reports of the Buleau of the Census ⁴ Textile Organon, publication of the Textile Economics Bureau, Incorporated Includes filament and staple fibers Data are United States producers' domestic shipments, plus imports for consumption ⁵ Textile Organon Nylon, acrylic, polyester, glass fiber, etc United States producers' shipment plus

imports for consumption broducers' man-made fiber waste consumed by mills related flax and silk imports for consumption broduled by made from unrounded data related to the fiber silver flower flower

Table 2.-Domestic consumption of fibers, actual and cotton equivalent: Total and per capita, 1955-1970

Year beginning	Popu- lation		Cotton			Wool		Rayo	on and acet	ate ⁵		on-cellulos -made fibe		All fit	pers ²
Jan. 1	July 1 ⁴	Total	Percent- age of fibers	Per capita	Total	Percent- age of fibers	Per capita	Total	Percent- age of fibers	Per capita	Total	Percent- age of fibers	Per capita	Total	Per capita ⁶
	Mil.	Mil. lb.	Pct.	Lb.	Mil. lb.	Pct.	Lb.	M il. lb.	Pct.	Lb.	Mil. lb.	Pct.	Lb.	Mil. lb.	Lb.
								Actual							
1955 1956 1957 1958 1959 1960 1961 1962 1963 1964 1965 1966 1967 1968 1968 1969 1970 ⁸	165.3 168.2 171.3 174.1 177.1 180.7 183.8 186.7 189.4 192.1 194.6 196.9 199.1 201.2 203.2	4,206.6 4,216.0 3,878.0 3,729.0 74,274.4 74,232.8 4,277.5 4,136.7 4,331.3 4,664.4 4,951.3 4,678.0 4,432.2 4,188.5 4,087.5	64.5 66.0 64.3 63.8 64.3 61.6 59.4 54.6 53.3 52.5 50.0 43.2 40.7 40.4	25.4 25.1 22.6 21.4 23.4 22.0 22.9 21.8 22.5 24.0 25.1 23.5 22.0 20.6 19.9	489.6 526.2 449.4 416.7 538.5 535.0 570.4 558.7 490.8 530.5 502.9 425.6 466.3 433.6	7.5 8.2 7.4 7.1 8.1 8.2 8.1 7.5 6.2 6.1 5.3 4.5 4.5 4.5	3.0 3.1 2.6 2.4 3.1 3.0 2.9 3.1 2.9 2.6 2.7 2.6 2.1 2.3 2.1	1,395.2 1,166.5 1,145.8 1,123.4 1,266.9 1,049.2 1,121.1 1,259.9 1,440.6 1,572.0 1,616.7 1,522.4 1,730.4 1,655.1 1,471.4	21.4 18.3 19.0 19.2 18.5 15.9 17.1 17.5 19.3 17.9 16.3 16.9 16.1 14.5	8.4 6.9 6.7 6.5 7.2 5.8 6.1 7.6 8.0 8.1 8.2 7.6 8.1 7.2	426.3 477.3 558.5 579.4 752.6 766.0 870.6 1,093.0 1,273.6 1,575.1 1,992.1 2,355.4 2,727.7 3,639.3 4,005.5	6.6 7.5 9.3 9.9 11.0 11.6 13.2 15.2 17.2 19.9 22.7 25.0 29.2 35.4 39.0 41.6	2.6 2.8 3.3 3.3 4.2 4.7 5.9 6.7 8.2 10.2 12.0 13.7 18.1 19.7 20.5	6,517.8 6,386.0 6,031.7 5,848.5 6,586.4 6,575.3 7,200.8 7,409.6 7,925.9 8,759.0 9,426.3 9,353.7 10,268.2 10,282.7 10,114.0	39.4 38.0 35.2 33.6 38.7 36.4 35.7 38.6 39.1 41.3 45.0 47.9 47.0 51.0 50.6 49.2
								Cotton eq	uivalent ³						
1955 1956 1957 1958 1959 1960 1961 1962 1963 1964 1965 1966 1967 1968 1969 1970 ⁸	165.3 168.3 171.3 174.1 177.1 180.7 189.4 192.1 194.6 196.9 199.1 201.2 203.2 205.4	4,206.6 4,216.0 3,878.0 74,274.4 74,232.8 4,277.5 4,136.7 4,331.3 4,678.0 4,478.0 4,4832.2 4,188.5 4,087.5	58.5 60.2 57.5 56.7 55.4 57.2 54.2 51.6 47.9 45.9 44.3 43.1 40.3 33.7 30.5	25.4 25.1 22.6 21.4 24.1 23.4 22.9 21.8 22.5 24.0 25.1 23.5 20.6 19.9	269.3 289.4 247.2 209.2 306.5 296.2 294.3 313.7 307.3 270.0 291.8 276.6 234.1 256.5 238.5 192.2	3.8 4.1 3.7 3.5 4.0 4.0 3.9 3.8 3.5 2.8 2.4 2.0 2.0 1.8 1.4	1.6 1.7 1.4 1.3 1.7 1.6 1.6 1.7 1.6 1.4 1.5 1.4 1.2	1,961.9 1,649.7 1,613.3 1,574.3 1,786.0 1,481.0 1,554.9 1,726.6 1,930.9 2,070.1 2,126.7 2,169.3 2,028.7 2,292.5 2,177.5 1,960.2	27.3 23.6 23.9 23.1 20.0 20.8 22.4 21.9 20.2 18.9 17.5 17.4 16.2 14.7	11.9 9.8 9.4 9.0 10.1 8.2 8.5 9.2 10.8 10.9 11.0 10.2 11.4 10.7 9.5	750.6 845.2 1,001.6 1,043.1 1,355.3 1,393.5 1,576.0 1,968.5 2,263.9 2,777.4 3,443.3 4,088.4 4,655.9 6,176.3 6,806.6 7,146.9	10.4 12.1 14.9 15.9 17.5 18.8 21.1 23.8 26.2 29.4 32.7 35.6 40.2 46.9 50.8 53.4	4.5 5.0 5.8 6.0 7.7 7.7 8.6 10.5 12.0 14.5 12.0 33.4 30.7 33.5 34.8	7,188.4 7,000.3 6,740.1 6,575.6 7,722.2 7,403.4 7,473.7 8,286.3 8,638.7 9,448.8 10,526.2 11,485.6 11,596.7 13,157.5 13,157.5	43.5 41.6 39.3 37.8 43.6 41.0 40.7 44.4 45.6 49.2 54.1 58.3 58.2 66.0 65.2

^{1 &}quot;Domestic" consumption data derived by adjusting mill consumption for raw fiber equivalent of U.S. foreign trade in textile products and for consumption of man-made waste fiber. The trade balance for man-made textile fiber products was allocated on the basis of relative production figures computed from Textile Economics Bureau reports. The man-made fiber waste was allocated on the basis of information provided by Stanley Hunt of the Textile Economics Bureau, Inc. 2 Does

not include flax and silk. ³ Based on cotton equivalent factors as follows: (a) regular and intermediate tenacity rayon and acetate filament yarn—1.51; (b) rayon and acetate staple fiber—1.10; (c) high tenacity rayon yarn—prior to 1953-1.53, 1954-1.64, 1955-1.71, 1956-1.74, 1957-1.77, 1958 to date—1.80; (d) non-cellulosic fiber for uses other than tires—1.74; (e) non-cellulosic fiber used in tires—2.73; (f) non-cellulosic staple fiber—1.37; and (g) glass fiber—1.70. wool fiber

based on cotton equivalent factor—0.55. ⁴ Bureau of the Census, Population continental United States as of July 1, including Armed Forces overseas. ⁵ Includes man-made producers' waste fiber. ⁶ Total divided by population and not a summation of per capita data. ⁷ Includes picker lap reported by the Bureau of the Census as raw cotton. ⁸ Preliminary. cotton-equivalent pounds results in a much larger total fiber market and a smaller cotton share. For instance, cotton's 1970 share of the 13.3 billion-pound equivalent domestic textile market was only 31 percent, compared with 57 percent in 1960 (figure 2). This reflects recent

growth in man-made fibers, a pound of which generally displaces more than a pound of cotton (table 2). A pound of non-cellulosic man-made fiber, for example, displaces an estimated average of 1.7 pounds of cotton.

CONSUMER DEMAND AND INTERFIBER COMPETITION

Many factors have caused demand for cotton to decline. An important one has been the emergence of many new and improved substitute products, particularly man-made fiber products. These products have entirely displaced cotton in some end uses, such as tire cord. More recently, partial displacement has become increasingly evident, generally through blending. This displacement has resulted from both price and nonprice factors.

PRICE COMPETITION

Cotton and man-made fibers have long competed on the basis of price. Perhaps the most intense competition has involved cotton and rayon and acetate staple fibers.² This competition probably has intensified with the development of modified rayon staples.

Non-cellulosic man-made staple fiber prices, after having declined sharply during recent years, now are also very close to cotton on an equivalent fiber basis. For example, the list price of 1.5 denier polyester staple, a common noncellulosic fiber, declined from \$1.29 per pound in 1960 to 61 cents in 1970—a drop of more than half. During the same period, the price for SM 1.1/16-inch cotton declined from 38 cents to 30 cents.

Superficially, polyester in 1970 appeared to be roughly twice as expensive as cotton. However, on a cotton-equivalent basis, the price gap narrows considerably: The adjusted cotton price is 34 cents and the polyester price is 51 cents (table 3). Furthermore, as list prices for polyester reportedly are discounted by about one-fourth or more, only a small real difference now is implied between cotton and polyester prices.

Recent experience suggests that perhaps the short-run price elasticity of demand for cotton, estimated at 0.1 to 0.23, is understated when cotton prices are rising and overstated when prices are declining. For example, cotton prices rose sharply in 1967 and 1968 in response to an anticipated supply shortage occasioned by a short 1967 crop. During this period, prices rose and cotton use dropped sharply-from about 9-1/2 million bales in 1966/67 to 8-1/4 million in 1968/69. Although a small part of this drop can be attributed to reduced military demand for cotton products, most was due to a substantial market loss to man-made fibers. For instance, man-made fiber blend output jumped more than 50 percent as cotton broadwoven goods production declined almost one-fifth. Man-made fiber's relatively stable supplies, and declining prices during the 2-year period, were in contrast to cotton. Although cotton

Table 3.—Cotton and man-made staple fibers: Price of cotton landed Group B mill points, list prices of man-made f.o.b. producing plants, actual and cotton equivalent, 1960-70

	Cott	ton¹		Ray	yon			Non-cel	lulosic ²		
Year beginning January 1			Reg	ular ³	Mod	ified ⁴ ,	Poly	ester	Acr	ylic	
	Actual	Cot. equiv. ^s	Actual	Cot. equiv. ⁵	Actual	Cot. equiv.⁵	Actual	Cot. equiv.⁵	Actual	Cot. equiv.⁵	
					Do	llars					
960 961 962 963 964 965 965 996 9967 988	.35	0.43 .43 .45 .44 .39 .33 .35 .40 .35	0.30 .27 .27 .27 .28 .28 .28 .28 .28	0.31 .28 .28 .28 .29 .29 .29 .29 .29	0.40 .40 .40 .38 .36 .36 .36 .37	0.42 .42 .42 .42 .38 .38 .38 .39 .40	1.29 1.17 1.14 1.14 .99 .84 .81 .63 .61	1.08 .98 .96 .96 .83 .71 .68 .53 .51	1.14 1.04 .93 .80 .80 .80 .78 .68	0.96 .87 .78 .67 .67 .67 .67 .57	

 $^{^1}$ SM $1\cdot 1/16^{\prime\prime}$, Group B mill points \div 0.96, to convert to a net-weight basis. 2 1.5 denier. 3 1.5 denier, viscose. 4 1.5 and 3.0 denier, viscose. 5 Actual prices converted to cotton equivalents as follows: Cotton, \div 0.88, Rayon, \div 0.96, and non-cellulosic, \div

²Waugh, Frederick. *Demand and Price Analysis*. Econ. Res. Ser. USDA Tech. Bul. No. 1316, 1964, Washington, D.C.

³ Donald, James R., Lowenstein, Frank, and Simon, Martin. *The Demand for Textile Fibers in the United States*. Econ. Res. Ser. USDA Tech. Bul. No. 1301; 1963, Washington, D.C.

 $^{1.19.\ ^6\,\}text{Prices}$ for August 1964-July 1966 exclude equalization payments.

Consumer and Marketing Service and Modern Textiles Magazine.

prices later declined, cotton was not able to recoup many of the market losses suffered during the period.

NONPRICE COMPETITION

Several studies indicate that cotton and man-made fiber price competition is overshadowed by nonprice factors.⁴ In addition to fashion and style, these factors include technology, promotion and advertising, and availability and stability of supplies.

Technological Developments Aid Man-made Fibers: Blends a Result

Significant gains in man-made fiber use can be attributed to technological developments in the textile industry. Durable press, for example, revolutionized the industry. Man-made fibers quickly capitalized on this development through blends and mixtures—blends through the combining of staple fibers of different properties prior to spinning, and mixtures where fabrics are made from 2 or more different yarns.

Such blends and mixtures, hereafter referred to as blends, have increased dramatically in recent years. The leading blend is polyester and cotton, usually 50-65 percent polyester. Substantial quantities of 65/35 and 50/50 polyester-cotton blends are used in such end uses as men's shirts and bedsheeting, respectively.⁵ Production of polyester-cotton blends in 1969 was more than 10 times that of 1960. This blend now accounts for about half of total blend production (table 4).

Blend production slightly exceeded 5 billion square yards in 1969, accounting for about one-third of the U.S. broadwoven fabric market. This was up from less than 2 billion square yards in 1960 when blends accounted for only 12 percent of the total market. The sharp expansion reflects significant substitution of blends for 100-percent fabric. All-cotton goods dropped from three-fourths to half the total broadwoven fabric market during the 1960's (table 4).

Large Expenditures for Research and Promotion

The development and marketing of improved man-made fiber products resulted from massive industry expenditures on research and promotion. Such expenditures have been estimated by several private sources at an aggregate annual level of \$250 million, far above similar expenditures for cotton.

To help counter erosion of cotton's markets and to improve its competitive position, the Cotton Research and Promotion Act was enacted in 1966. Under auspices of the Act, Cotton, Incorporated (formerly Cotton)

Table 4.—Cotton and man-made fiber broadwoven fabric production

Item	1960	1969
Cotton 100 percent Biends Man-made fiber 100 percent Blends Polyester Polyester/cotton Polyester/other	Million squ 11,197 10,677 520 3,267 2,025 1,242 391 219 172	9,181 8,481 700 7,614 2,717 4,897 3,182 2,604 578
Other	851 14,464	16,795

¹ Estimated.

Compiled from Current Industrial Reports of the Bureau of the Census.

Producers' Institute) now is allocating each year about \$10 million of producers' contributions to research and promotion. Research is aimed at developing new and improved cotton products as well as reducing farm production costs. Promotion, of course, is aimed at increasing demand for cotton.

Cotton research and promotion will likely receive increased attention during the 1970's. And greater emphasis likely will be placed on research. Cotton, Incorporated's \$10 million budget for 1971 calls for about an equal division of expenditures between research and promotion, compared with previous budgets in which about one-third was allocated to research. The 1971 program emphasizes cooperation with textile mills and manufacturers in advertising as well as in coordinating market development and technical research activities. Reduction of farm production costs also will receive major attention.

Moreover, the Agricultural Act of 1970 provides for additional funds for cotton research and promotion. For each of the 1971, 1972, and 1973 crops, the law authorizes up to \$10 million. Also, for both the 1972 and 1973 crops, the Secretary has the discretion to make an additional \$10 million available.

Production Variability Hurts Cotton

A third nonprice factor which has probably hurt cotton use in its battle with man-made fibers may be termed production variability. In contrast to man-made fibers, cotton output has fluctuated greatly. Also, there have been imbalances among the various staple lengths and grades. As mentioned earlier, the extremely small 1967/68 cotton crop and trade expectations for reduced supplies of longer staples were particularly damaging.

Man-made fiber production, on the other hand, is not subject to factors such as weather, insects, and plant disease, so output can more easily be adjusted to changing market conditions. Because of exceptionally

⁴Ward, Lionel E. Interfiber Competition with Emphasis on Cotton, Unpublished Doctoral Thesis, 1968, University of California at Davis; Barlowe, Russell G. Analysis of Cotton and Man-made Fiber Substitution in End-use Item Consumption in the United States, Unpublished Masters Thesis, 1967, Univ. of Md. ⁵ Barlowe, Russell G. and Donald, James R. "Recent Changes in Selected Cotton End Uses." Econ. Res. Ser. Cotton Situation. CS-243, October 1969.

strong demand for man-made fibers, particularly non-cellulosic fibers, production capacity has more than doubled since the early 1960's. Further expansion is projected for the early 1970's by the Textile Economics Bureau, a private trade organization. It expects producing capacity to reach 8.5 billion pounds by November 1972, an increase of about 18 percent from November 1970.

Planned increases are sharpest for man-made staple fibers, some of which compete directly with cotton. Non-cellulosic staple capacity may increase almost one-fifth by November 1972 with capacity for polyester staple, one of cotton's fiercest competitors, increasing about one-fourth. Producing capacity for rayon and acetate staple may gain slightly.

Over the next few years, cotton growers will have greater flexibility in tailoring production to market needs. Under provisions of the Agricultural Act of 1970, acreage allotments and marketing quotas are suspended for each of the 1971 through 1973 crops. Cotton producers, after meeting "set-aside" requirements and maintaining their soil conserving base, may increase plantings and not be subject to marketing quota penalties. However, price-support payments will be made only on the base acreage allotment, while price-support loans will be available on total production in 1971. Also, in 1972 and 1973, loans on total production will be available if the carryover does not exceed 7.2 million bales.

COTTON'S COMPETITIVE LOSSES

Although domestic cotton use of a little over 4 billion pounds in 1969 approximated the 1960 level, cotton's share of the total fiber market on a cotton-equivalent basis fell sharply (figure 2). In general, this meant that cotton failed to capture any of the rapidly expanding market for textiles during the 1960's. Cotton indirectly lost perhaps up to one-fourth of its textile market to man-made fibers. If cotton had been able to maintain its 1960 share of all end uses in which it is competitive, and assuming the same expansion in the total fiber market during the 1960's, domestic cotton use would have been about 1-1/4 billion pounds or 2-1/2 million bales greater in 1969.6

Cotton Apparel Use Falters

Apparel is cotton's largest market, accounting for almost half of end-use consumption. In 1969, about 1.9 billion pounds of cotton (9.5 pounds per person) were consumed in apparel items, according to National

⁶Cotton was judged competitive in all end uses in which its 1969 market share exceeded 10 percent. Some uses in which cotton's share was less than 10 percent were excluded altogether from the competitive-loss computation; others were included only to the extent that cotton suffered direct displacement from man-made fibers, i.e. some carpets and rugs.

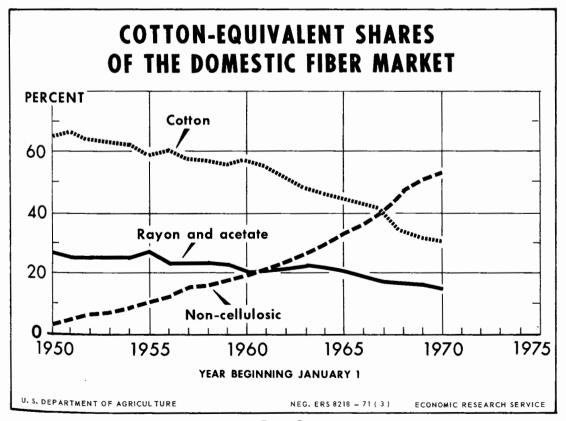


Figure 2

Cotton Council estimates.⁷ This was down from 11.8 pounds per capita at the beginning of the decade. Use in 1969 represented about 45 percent of the total apparel market on a cotton-equivalent basis, down from 64 percent in 1960. If cotton had been able to maintain its 1960 share throughout the decade, total cotton apparel use possibly would have been over three-fourths billion pounds greater in 1969. Thus, cotton lost perhaps almost one-third of its apparel market during the 1960's (table 5).

In terms of per capita use, men's and boy's clothing is the largest apparel category. Men purchased the equivalent of about 28 pounds of fiber in 1969, about half cotton. This compares with total use of 23 pounds per capita in 1960, of which about three-fourths was cotton. As a result, cotton's declining share of the market implies an indirect loss of about half a billion pounds, or about one-third of its market between 1960 and 1969.

In contrast to men's and boys' apparel, per capita use of women's and misses' apparel declined slightly during the decade. About a 3 pound loss in cotton use more than offset increased man-made fiber use. Thus, cotton suffered its greatest percentage loss in this market, losing over one-third during the 1960's.

The only apparel market cotton still dominates is girls' and children's clothing. Cotton's share was 60 percent in 1969; however, this was 15 percentage points below the 1960 level. Thus, cotton lost about one-fifth of this market to man-made fibers during 1960-69 (table 5).

Cotton Lags in Household Market

The past decade saw a rapid growth in the household textile market, cotton's second largest end use, Increasing demand for carpets, rugs, sheets, towels, drapery, and upholstery pushed use from 11.6 cotton-equivalent pounds per capita in 1960 to 182 pounds in 1969. However, as in the case of the apparel market, cotton failed to keep pace. Although use of cotton expanded 15 percent during the decade, its market share slipped from 57 to 37 percent. Much of this slippage was due to increasing use of man-made fibers in carpets and rugs, an end use apparently not as well suited to cotton and one in which less price competition is evident. Taking this into consideration (see footnote 6), cotton's actual losses amounted to about one-fifth of the household market-far less than in the apparel market (table 5).

Smallest Cotton Losses in Industrial Market

The third largest use for cotton is industrial products, a market in which cotton experienced its smallest losses during the 1960's as its share declined from 27 percent to 22 percent. After adjusting for non-competitive uses, such as tire cord and bags, cotton's loss amounted to about 17 percent of the market—less than in either the apparel or household markets (table 5). Smaller industrial cotton losses during the 1960's, however, also indicated that cotton had already lost most of this market prior to 1960; the tire cord market is a good example.

PROSPECTIVE FIBER USE DURING THE 1970'S

FACTORS AFFECTING DEMAND

Consumer demand for fibers in the United States during the 1970's will depend largely on the level of disposable personal income, the size and age-sex composition of the population, tastes and preferences, and technological developments in the textile industry. Also, increased leisure will have positive implications for fiber use, as demand increases for sportswear and vacation home furnishings. Textile product performance characteristics, such as comfort, durability, and easy care, will likely receive increased emphasis during the 1970's. Improved blends of cotton and man-made fibers probably will comprise a larger part of the apparel and household markets by 1980.

Population and Income of Greatest Significance

Population and income likely will affect fiber use most in the next decade. During the 1970's, the U.S. population is expected to increase 10 to 15 percent.⁸

⁷Based on data published in *Cotton Counts Its Customers*, National Cotton Council of America, June 1970, and adjusted for the estimated net trade balance of textile manufactures.

The lower end of this range conforms fairly close to current birth rates and prospective growth. If other factors remain constant, this would imply about a 10-12 percent increase in aggregate fiber use by 1980.

In addition, the continually changing age-sex composition of the population has important ramifications. For instance, a larger proportion of the U.S. population will be in the higher consuming 25-45 age group by 1980.

The average consumer's real disposable income may increase about one-third during the 1970's. This should result in greater total fiber use. Past studies have indicated an income elasticity of demand for fiber in the range of 0.5 to 1.0.° This means that a 10-percent increase in per capita disposable personal income elicits a 5-10 percent expansion in fiber use, assuming other

⁸For 1980, the Census Bureau's Series "C" U.S. population projection indicates 235.2 million; the Series "D" projection indicates 227.5 million.

⁹ Donald, James R., Lowenstein, Frank, and Simon, Martin S. The Demand for Textile Fibers in the United States. Tech. Bul. 1301 (Nov. 1963) USDA, ERS; Cotton and Other Fiber Problems and Policies in the United States, National Advisory Commission on Food and Fiber, Washington, D.C. July 1967.

			1960					1969			Cott	on's etitive
Item	Cotto	on use	Total	fiber	Cattania	Cotto	n use	Total	fiber	Cotton's	loss	ses ²
	Total	Per capita	Total	Per capita	Cotton's market share	Total	Per capita	Total	Per capita	market share	Total	Percent- age
	Mil. lb.	Lb.	Mil. lb.	Lb.	Pct.	Mil. lb.	Lb.	Mil. lb.	Lb.	Pct.	Mil. lb.	Pct.
Apparel	2,132	11.8	3,351	18.6	64	1,918	9.5	4,257	21.1	45	³ 850	31
Men's and boys'	1,294	16.5	1,780	22.7	73	1,267	14.2	2,511	28.1	50	577	31
Women's and Misses'	511	8.0	1,134	17.8	45	355	4.8	1,254	16.9	28	197	36
Girls' and Childrens'	327	8.6	437	11.5	75	296	7.7	492	12.8	60	76	20
Household	1,181	6.6	2,085	11.6	57	1,360	6.7	3,667	18.2	37	314	19
Industrial	741	4.1	2,695	15.0	27	703	3.5	3,188	15.8	22	133	17
Total	4,054	22.5	8,131	45.2	50	3,981	19.7	11,112	55.0	36	³ 1,297	25

¹ Data of National Cotton Council converted to pounds and adjusted for the estimated net trade balance of textile manufactures. ² Cotton's competitive losses were calculated by holding cotton's 1960 market share constant throughout the decade for each major end-use

category. Some specific end uses in which cotton's 1969 share was below 10 percent, such as sweaters, men's tailored coats and jackets, automotive floor covering, industrial tape, and machine ribbons, were excluded; others, such as women's gloves and hosiery, carpets and rugs,

tire cord, bags, nets, and electrical insulation, were included only to the extent that cotton suffered direct displacement from man-made fibers during 1960-69. ³ Sum of categories.

Source: Based on Cotton Counts Its Customers, National Cotton Council of America.

factors remain about constant. If this relationship holds through the next decade—where real disposable personal income is expected to increase about one-third to about \$3,500 per capita—consumption by U.S. mills would total about one-fourth above the 46.5 pounds per capita consumed in 1970.

Sharp Decline in Fiber Prices May Halt

Fiber consumption during the 1970's also will be influenced by fiber prices, but the impact on aggregate use probably will be less than in the 1960's. Although cotton and man-made fiber prices, particularly the non-cellulosic staples, dropped sharply during the past decade, further substantial price declines are less likely in future years. Both man-made fiber prices, which are reportedly discounted a fourth or more from list prices, and cotton prices now may be near production costs. ¹⁰ Relative prices, of course, will continue to influence the final composition of fiber demand.

Further Technological Advances

Technological developments, which played such an important role in textile fiber use during the 1960's, will continue to receive a great deal of eemphasis. The trend from 100-percent cotton fabric to man-made fiber blends will likely continue in the 1970's, although it may slow since the pentration of blends has reached the point where further substantial substitution may not be feasible for many end uses. Also, the cotton proportion may increase for some blends, such as men's shirts, where cotton currently accounts for about 35 percent of the average blend.

Greater Research and Promotion Expenditures

Finally, continued large expenditures on textile research and promotion are probable during the 1970's. As in the 1960's, sizable funds for man-made fibers will likely be devoted to product development and advertising, although the cost-price squeeze for some man-made fibers may limit larger expenditures. Funds currently available for man-made fiber research and promotion are perhaps 10 times the total spent on cotton. In response to the prospect of continuing stiff competition from man-made fibers, cotton research and promotion likely will expand during the next few years. As pointed out earlier, there are indications that cotton interests will attempt to reduce man-made fiber's advantage in this important area through both private and governmentsupported programs. For instance, the Agricultural Act of 1970 provides additional funds for cotton research and promotion during the early 1970's.

TEXTILE PROJECTIONS FOR 1980

Fiber Use to Keep Expanding

By 1980, the average American consumer may use 10-15 more pounds of fiber processed in U.S. mills than he did in 1970. Total per capita fiber use may grow about 2 percent annually during the 1970's, compared with an annual growth rate of nearly 4 percent during the past decade. This would mean total mill use of fibers of 55 to 60 pounds per capita in 1980, compared with 46.5 pounds in 1970.11 Most of this increase will likely be man-made fibers, particularly the non-cellulosics Although per capita mill use of rayon and acetate leveled off in the late 1960's, portending little change for the 1970's, non-cellulosic consumption may expand about 5 percent a year during the next decade. However, this would be less than one-third the rate of the past 2 decades, reflecting limited prospects for further substantial displacement of natural fibers. Still, per capita non-cellulosic use may reach 30 to 35 pounds by 1980, over 50 percent above the present level (table 6).

Prospective Cotton Use Brighter

The outlook for U.S. mill use of cotton during the 1970's is brighter than in recent years. Since World War II, per capita use has steadily trended downward, However, assuming supplies are available at competitive prices, the downward trend may moderate further as increased cotton research and promotion stimulate consumption. A Gompertz curve fit to per capita mill use since 1941 shows a gradually slower decline in use over the past 3 decades (figure 3). Projection to 1980 indicates a further small decline in per capita cotton consumption. The annual rate of decline over the next 10 years will likely average less than half of 1 percent, compared with declines of 1.1 percent during the 1960's and 3.4 percent in the 1950's. As a result, per capita cotton use by U.S. mills may total about 18 pounds in 1980, compared with 18.6 pounds in 1970 (figure 3 and table 6). But a tenth larger population will more than offset this decline. Thus, with a growing population, prospective cotton use of 8-1/2 to 9 million bales is indicated for 1980, compared with 8 million in 1970.12

Textile Imports May Increase

Imports of cotton manufactures captured an additional 1 percent of the domestic market every 2

¹⁰ Actually, cotton prices are now near or below the cost of production on some farms. However, producers receive direct payments of about 15 cents per pound on cotton produced on their share of the national base acreage allotment.

¹¹This is a little higher than the estimate of 54 pounds per capita for the domestic fiber market published in *Cotton and Other Fiber Problems and Policies in the United States*, National Advisory Commission on Food and Fiber, Washington, D.C., July 1967. A greater projected increase in non-cellulosic use in primarily responsible.

¹² Based on the Census Bureau's Series "D" U.S. population projection for 1980, use would total about 8.5 million bales; the Series "C" projection indicates use of 8.8 million.

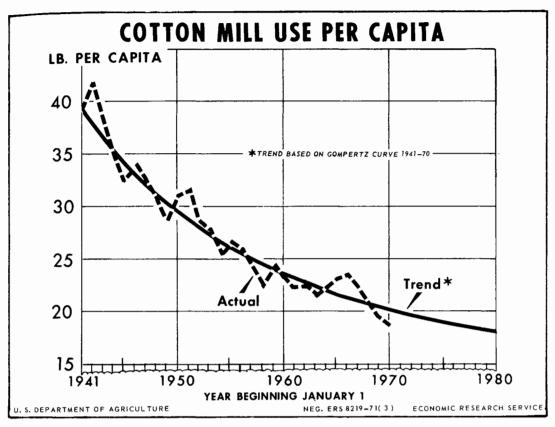


Figure 3

Table 6.—Per capita mill use of fibers: Actual 1950-70 and projected 1980

	Ann	ual growth	rates	F	Per capita u	se
Fibers	1950-59	1960-69	Projected 1970-79	1960	1970¹	1980
		Percent		-	Pounds	
Cotton Rayon/acetate	-3.4 -2.5	-1.1 +3.1	(²)	23.2 6.0	18.6 6.9	18
Non-cellulosic		+18.6	+4-6	4.4	19.8	30-35
Total ³	-2.3	+3.9	+1.5-2.5	35.9	46.5	55-60

¹ Preliminary. ² Less than 0.5 percent decline. ³ Includes historical data for wool, silk, and flax

years on the average during the past decade. This expanding U.S. use of foreign cotton products is largely related to labor cost differentials which allow imported items to be priced below many domestically produced products. If recent trends continue, imports during the 1970's will increase their share of the domestic market about 0.5 percentage point annually.¹³ This would raise cotton textile imports' share of the domestic market to about 17 percent in 1980, compared with 12 percent in 1970 (table 7).

Man-made fiber manufactured imports have gained rapidly in recent years, both in terms of quantity and as a share of the domestic market. However, these imports still accounted for less than 6 percent of the total domestic market in 1970. But, like cotton, man-made fiber imports may increase their share of the domestic market about 0.5 percentage point annually during the next decade. Thus, imports of man-made fiber textiles in 1980 may total a little over 1 billion equivalent pounds, or around 10 percent of the domestic man-made fiber market (table 7).

In contrast to imports, exports of textile products from the United States showed little change in the 1960's, after trending downward in the 1950's. Cotton exports averaged about 200 million equivalent pounds during 1965-69 and little change is expected from this level during the 1970's. Man-made fiber textile exports trended up slightly during the past decade. However,

foreign man-made fiber production is increasing rapidly. Thus, U.S. exports of man-made fiber products may remain near the 1970 level, meaning shipments of about 150 million equivalent pounds in 1980 (table 7).

As a result of larger prospective textile imports and relatively stable exports, the net import trade balance for both cotton and man-made fibers is projected to rise substantially by 1980. The cotton import balance may total over half a billion equivalent pounds, about double the 1970 level, while the man-made fiber import balance may increase to almost 1 billion equivalent pounds, about 5 times the current level (table 7).

Increasing Imports and Mill Use to Boost Domestic Consumption

Boosted by larger mill use and increasing cotton textile imports, domestic cotton consumption (mill use adjusted for textile trade) may expand over 1 million bales during the 1970's. This would place total domestic use at around 10 million bales in 1980, compared with 8-1/2 million in 1970.

Man-made fiber domestic use may nearly double during the next decade, reaching about 10 billion pounds by 1980. This compares with 5.7 billion pounds in 1970 and less than 2 billion in 1960.

As a result, total domestic use of cotton and man-made fibers may increase by half during the 1970's, reaching a projected 15 billion pounds by 1980 (table 7). This would mean an increase of over 15 pounds per capita in domestic fiber use.

¹³This assumes an extension of the cotton Long-Term Textile Agreement, which has been in effect since 1962.

Table 7.— Mill use, textile trade, and domestic use for cotton and man-made fibers: 1960, 1965-70, projected 1980

		,			
Fiber	Mitt		Textile trade		Domestic
and year	use	Imports	Exports	Net	use
		ı.	Iillion pounds		
COTTON					
1960	4,191	¹ 275	233	+42	4,233
1965	4.477	361	174	+187	4.664
1966	4,631	510	190	+321	4.951
1967	4,423	443	188	+255	4,678
1968	4,147	474	188	+286	4,432
1969	3,933	488	232	+256	4,189
1970 ²	3,815	472	200	+273	4,088
1980	4,100	³ 800	200	+600	4,700
	,				•
MAN-MADE					
1960	1,875	31	91	-59	1,815
1965	3,614	79	129	-50	3,564
1966	3,989	123	140	-17	3,972
1967	4,244	139	133	+6	4,250
1968	5,305	193	129	+64	5,370
1969	5,549	257	146	+111	5,661
1970 ²	5,495	329	147	+182	5,677
1980	9,100	³ 1,050	150	+900	10,000
TOTAL ⁴					
1960	6,477	439	329	+110	6,586
1965	8,479	596	315	+280	8.759
1966	8,990	776	340	+437	9,426
1967	8,980	704	330	+374	9,354
1968	9,782	813	327	+487	10,268
1969	9,795	875	387	+488	10,283
1970 ²	9,550	918	354	+564	10,283
19805	13,275	³ 1,850	350	+1,500	14,775

¹ Includes picker laps imported as raw cotton. ² Preliminary. ³ Data based on continued annual import penetration of 0.5 percent. ⁴ Includes wool. ⁵ Excludes wool.

Compiled from unrounded data.

Table 13.—Cotton: Acreage, planted and harvested, production, and yield per acre on harvested acreage, by regions, 1960 to date

			Un marves	ted acreage,	- I regions			 			
Crop year begin- ning August 1	W	/est ¹	So	uthwest ²		Del	ta ³		Southea	ast ⁴	Total
	1,000 acres	Percent of total	1,000 acres	Percer of tot		000 res		cent total	1,000 acres	Percent of total	1,000 acres
					Planted	acreag	e ⁵				
1960	1,619 1,446 1,454 1,353 1,338 1,274 1,031 977 1,158 1,183 1,098 1,171	10.1 8.7 8.9 9.1 9.0 9.0 10.0 10.3 10.6 9.9 9.2 9.7	7,455 7,785 7,595 6,845 6,835 4,712 4,385 4,871 5,675 5,777 5,901	46.9 46.6 46.1 45.5 45.5 46.4 44.7 47.8 48.4	4, 4, 4, 2, 2, 3, 3,	433 639 573 165 182 094 989 720 343 495 560	28 28 28 28 28 28 28 28 28 28 28 28 28 2	7.6 3.0 3.1 3.1 3.2 3.9 3.9 3.8 5.6 6.4 9.8	2,573 2,718 2,671 2,480 2,477 2,349 1,617 1,366 1,540 1,529 1,507 1,481	16.0 16.4 16.4 16.7 16.7 16.6 15.6 14.5 14.1 12.9 12.6 12.3	16,080 16,588 16,293 14,843 14,836 14,152 10,349 9,448 10,912 11,882 11,942 12,061
					Harve	sted ac	reage				
1960 1961 1962 1963 1964 1965 1966 1967 1968 1969 19706	1,577 1,409 1,418 1,310 1,306 1,241 1,006 957 1,138 1,159 1,081	10.3 9.0 9.1 9.2 9.3 9.1 10.5 11.8 11.2 10.5 9.7	6,955 7,205 7,112 6,440 6,250 6,120 4,348 3,895 5,140 5,301	46.1 45.7 45.3 44.5 45.0 45.5 49.2 44.3 46.5	4, 4, 4, 3, 2, 2, 3,	284 404 434 042 080 974 774 262 049 358 395	2: 2: 2: 2: 2: 2: 3: 3:	3.0 3.2 3.5 3.5 3.5 9.0 9.2 9.1 7.8 7.8 0.3	2,493 2,616 2,605 2,420 2,421 2,280 1,424 883 1,468 1,401 1,391	16.3 16.7 16.7 17.0 17.2 16.7 14.9 11.2 14.5 12.7 12.4	15,309 15,634 15,569 14,212 14,057 13,615 9,552 7,997 10,160 11,058 11,168
					Prod	uction		-			
	1,000	Percent	1,000	Percei	nt 1,	000		cent	1,000	Percent	1,000
1960	bales ⁸ 3,086 2,823 3,128 2,830 2,822 2,714 1,928 1,655 2,488 2,109 1,793	of total 21.6 19.7 21.0 18.4 18.6 18.2 20.1 22.2 22.7 21.1 17.5	bales* 4,804 5,155 5,037 4,753 4,410 5,037 3,396 2,961 3,789 3,141 3,432	33.7 36.0 33.9 31.0 29.0 33.6 35.5 39.7 34.6	4, 4, 4, 5, 5, 5, 3,	les ⁸ 448 497 724 423 483 066 086 184 621 699 859	333333333333333333333333333333333333333	1.2 1.4 1.8 5.4 3.8 2.2 9.3 3.1 6.9	bales* 1,934 1,843 1,978 2,328 2,467 2,156 1,165 658 1,050 1,060 1,186	13.5 12.9 13.3 15.2 16.3 14.4 12.2 8.8 9.6 10.6 11.5	bales* 14,272 14,318 14,867 15,334 15,182 14,973 9,575 7,458 10,948 10,009 10,270
				Yield i	per acre or	harve	sted ac	reage			
	W	est ¹	South	west ²	De	elta ³		Sout	:heast ⁴	United	d States
	Pounds ⁹ Pounds ¹⁰		Pounds ⁹	Pounds ¹⁰	Pounds ⁹	Poun	ds ¹⁰	Pounds9	Pounds ¹⁰	Pounds9	Pounds 10
1960 1961 1962 1963 1964 1965 1966 1967 1968 1969 1970 ⁶	937 982 331 959 992 343 1,056 1,004 339 1,034 1,026 354 1,035 1,018 338 1,047 972 394 918 975 375 828 942 364 1,047 891 404 871 293 796 310		343 339 354 338 394 375 364 404 293	345 339 341 354 360 365 375 366 349	497 489 510 642 643 610 532 462 569 528 546	49 53 55 57 58 57 58 57	37 56 79 37 78 53	371 338 363 461 488 453 392 356 342 362 409	376 384 404 421 431 430 406 381 372	446 438 457 517 527 480 447 516 434 441	454 464 475 491 500 498 497 481 464

¹ California, Arizona, New Mexico, and Nevada. ² Texas and Oklahoma. ³ Missouri, Arkansas, Tennessee, Mississippi, Louisiana, Illinois, and Kentucky. ⁴ Virginia, North Carolina, South Carolina, Georgia, Florida, and Alabama. ⁵ Not adjusted for final acreage compliance with allotments. ⁶ Preliminary.

Statistical Reporting Service.

⁷ Indicated March 16, 1971. ⁸ 500-pound gross weight bales. ⁹ Actual yield per acre. ¹⁰ Yield trend—the 5-year centered average.

Table 14.- Cotton: Supply and distribution, by types, United States, 1955 to date

		14.— Cotton:	Ouppiy din	a distribution	, 2, 1, 100, 1		1555 to date		
	crop less ginnings 1 crop less ginnings 2 crop less ginnings 3 crop less ginnings 4 crop less less less less less less less les			oply				Distribution	
Year		Ginn	ings						
beginning August 1	over	crop less	New crop ²	Net imports	City crop	Total	Mill consump- tion ³	Net exports	Total
					1,000 bales ⁴	•			
					All kinds				
1955	14,528.8 11,322.6 8,737.0 8,884.9 7,558.7	12,746.4 10,649.6 11,222.8 14,364.6 14,125.2	404.8 230.8 212.6 150.5 139.8 227.7	136.6 136.4 141.2 136.5 130.7 \$127.2	47.0 50.0 58.0 51.0 50.0 63.0	26,021.9 27,692.4 22,384.0 20,297.8 23,570.0 22,101.8	9,209.6 8,608.4 7,999.2 8,702.8 9,016.7 8,279.3	2,214.7 7,597.7 5,716.8 2,789.5 7,182.4 6,632.4	11,424.3 16,206.0 13,716.0 11,492.3 16,199.1 14,911.7
1961	7,227.8 7,831.4 11,215.6 12,378.3 14,290.6 16,862.5 12,533.3	14,096.8 14,576.8 15,045.3 14,996.9 14,752.8 9,552.5 7,182.1	287.4 244.7 152.1 180.1 9.9 265.5 6.1	5 15'2.4 136.6 6 134.8 118.2 118.4 104.6 149.1	64.0 68.0 102.0 70.0 87.6 50.0 30.0	21,828.5 22,857.5 26,649.8 27,743.5 29,259.3 26,826.1 19,900.6	8,953.8 8,418.9 8,608.7 9,170.9 9,496.8 9,484.9	4,912.9 3,350.9 5,662.4 4,059.6 2,942.1 4,668.8	13,866.7 11,769.8 14,271.1 13,230.5 12,438.9 14,153.7
1967	6,448.3 6,520.8 5,760.5	10,910.5 9,857.3 10,116.1	79.8 6.0	67.6 51.9 50.0	40.0 40.0 40.0	17,546.2 16,476.0 15,966.6	8,981.5 8,242.2 7,990.6 8,005.0	4,205.6 2,731.4 2,768.2 3,515.0	13,187.1 10,973.6 10,758.8 11,520.0
			<u>.</u>		nan extra-lor	ng staple			
1955. 1956. 1957. 1958. 1959. 1960.	11,028.5 14,399.0 11,269.3 8,615.3 8,732.6 7,404.3 7,089.5	14,186.6 12,697.3 10,569.9 11,140.9 14,295.5 14,059.2 14,035.8	404.8 230.8 212.6 150.5 139.8 277.7 287.4	50.7 43.3 96.6 51.0 47.5 \$41.5 \$68.2	47.0 50.0 58.0 51.0 50.0 63.0 64.0	25,717.6 27,420.4 22,206.4 20,008.7 23,265.4 21,795.7 21,544.9	9,084.7 8,496.2 7,899.8 8,593.7 8,879.4 8,131.2 8,783.2	2,194.4 7,539.8 5,707.1 2,766.0 7,178.2 6,625.0 4,905.8	11,279.1 16,036.0 13,606.8 11,359.6 16,057.6 14,756.3 13,689.0
1962 1963 1964 1965 1966 1967 1968 1968	7,741.0 11,016.0 12,125.1 14,031.3 16,574.0 12,279.5 6,257.6 6,365.5 5,653.1	14,467.0 14,884.1 14,880.2 14,667.2 9,481.3 7,113.8 10,832.3 9,780.5	244.7 152.1 180.1 9.9 256.5 6.1 79.8 6.0	54.5 6 54.4 35.5 30.8 28.9 57.6 37.9 30.9	68.0 102.0 70.0 87.6 50.0 30.0 40.0 40.0	22,575.2 26,208.6 27,290.9 28,826.8 26,390.7 19,487.0 17,247.6 16,222.9 15,782.1	8,258.3 8,468.0 9,018.6 9,355.9 9,349.9 8,854.0 8,115.9 7,879.0	3,348.2 5,660.8 4,038.4 2,936.4 4,655.9 4,161.3 2,722.9 2,753.3 3,500.0	11,606.5 14,128.8 13,057.0 12,292.3 14,005.8 13,015.3 10,838.8 10,632.3 11,400.0
:					other tha		,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,	0,000.0	11,400.0
1955 1956 1957 1958 1959 1960 1961 1962 1963 1964 1965	176.9 129.8 53.3 121.7 152.3 154.4 138.3 8 90.4 8 199.6 8 253.2 8 259.3	41.5 49.1 79.7 81.9 69.1 66.0 61.0 109.8 161.2 116.7 85.6		85.9 93.1 44.6 85.5 83.2 85.7 84.2 82.1 6 80.4 82.7 87.6		304.3 272.0 177.6 289.1 304.6 306.1 283.6 282.3 441.2 452.6 432.5	124.9 112.2 99.4 109.1 137.3 148.1 170.6 160.6 140.7 152.3 140.9	20.3 57.9 9.7 23.5 4.2 7.4 7.1 2.7 1.6 21.2 5.7	145.2 170.1 109.1 132.6 141.5 155.4 177.7 163.3 142.3 173.5
1966	8 288.5 8 253.8 190.7 155.3 107.4	71.2 68.3 78.2 76.8		75.7 1191.5 29.7 21.0 20.0		435.4 413.6 298.6 253.1 184.5	135.0 127.5 126.3 111.6 105.0	12.9 44.3 8.5 14.9 15.0	147.9 171.8 134.8 126.5 120.0

Current crop less ginnings prior to August 1 beginning of season. ²Ginnings prior to August 1 end of season. ³ Adjusted to cotton marketing year basis, August 1-July 31. ⁴Running bales except "net imports" which are in bales of 500 pounds, gross weight. ⁵Does not include picker laps reported as raw cotton by the Bureau of the Census. ⁶Imports for consumption beginning 1963. ⁷Includes American-Egyptian, Sea Island, and foreign-grown cotton. In some years prior to 1962, small amounts of foreign-grown long-staple upland cotton are included. ⁸Foreign stockpile cotton included by the Bureau of the Census as of August 1 was 7,168 bales in 1962, 61,168 in

1963, 27,474 in 1964, 18,307 in 1965, 12,500 in 1966, and 884 in 1967. In bond cotton is not included: 116,609 bales as of August 1 in 1963, 60,297 in 1964, 38,022 in 1965, and 33,284 in 1966. Preliminary and estimated. Bureau of the Census ginnings report of March 22, 1971. Imports exceed quota of 85,600 bales, in part, because import data are not adjusted to August 1-July 31 marketing year. Also, may include 6,000 or more bales of cotton stapling less than 1-3/8 inches.

Bureau of the Census.

Table 15.—Raw cotton equivalent of U.S. imports for consumption of cotton manufactures, 1965 to date

							T												
		`	Yarn, threa	d, and clot	:h						Primarily m	anufactur	ed products						
Year and month		Sewing	Cle	oth	То	tal	Pile	Table	Bed-	Gloves	Other	Lace	House-	Misc.	Floor	Tot	al	Tot	al
	Yarn	thread crochet, knitting yarn	Prima- rily cotton	Other ¹	Weight	Bales	fabrics and mfrs.	damask and mfrs, ²	clothes and towels ³	hosiery and hdkf	wearing apparel ⁴	fabric and arti- cles ⁵	hold and clothing arti- cles ⁶	prod- ucts ⁷	covering	Weight	Bales	Weight	Bales
	1,000 pounds	1,000 pounds	1,000 pounds	1,000 pounds	1,000 pounds	1,000 bales ⁸	1,000 bales ⁸	1,000 bales ⁸	1,000 bales ⁸	1,000 bales ⁸	1,000 pounds	1,000 pounds	1,000 pounds	1,000 pounds	1,000 pounds	1,000 pounds	1,000 bales ⁸	1,000 pounds	1,000 bales ⁸
1965 1966 1967 1968 1969 1970°	24,414 101,919 43,620 57,217 31,049 24,345	324 345 277 456 337 376	173,359 218,210 201,531 194,143 220,245 211,801	5,038 10,012 12,385 16,775 23,531 24,262	203,235 330,486 257,813 268,591 275,162 260,784	523.2 688.5 537.1 559.6 573.3 543.3	5,349 5,929 6,162 7,080 8,269 8,671	3,315 3,174 2,410 1,857 2,511 1,943	16,885 27,302 28,577 34,539 34,339 32,349	2,9444 3,090 3,126 3,555 3,320 2,861	116,947 124,910 129,966 136,492 139,396 139,854	1,198 1,306 1,323 1,610 1,852 1,471	6,682 9,498 9,178 12,002 13,213 12,126	2,295 2,913 3,386 4,633 5,756 8,177	1,960 1,689 1,444 3,487 4,079 4,078	157,575 179,811 185,572 205,255 212,735 211,530	328.3 374.6 386.6 427.6 443.2 440.7	360,710 510,297 443,385 473,846 487,897 472,314	751.5 1,063.1 923.7 987.2 1,016.5 984.0
1969 Jan. Feb. Mar. Apr. Apr. June July Aug. Sept. Oct. Nov. Dec.	1,584 1,581 2,812 4,623 3,017 3,758 3,126 2,397 1,592 1,821 2,128 2,589	12 8 56 29 42 40 27 16 24 30 17 36	5,188 11,690 24,492 27,005 17,231 23,625 16,431 22,876 18,369 16,935 19,621 16,872	933 941 1,856 2,805 2,486 3,060 2,271 2,191 1,706 1,952 1,706 1,619	7,717 14,220 29,216 34,462 22,776 30,483 21,855 27,480 21,691 20,738 23,472 21,116	16.1 29.6 60.9 71.8 47.4 63.5 45.5 57.2 45.2 43.2 48.9 44.0	160 302 476 811 759 936 922 800 850 1,003 559 691	66 114 237 179 218 218 253 185 235 315 261 230	1,906 1,995 4,160 3,073 4,697 3,104 2,934 2,513 2,287 2,287 2,258 2,790 2,625	204 227 324 301 302 315 234 281 273 251 283 327	8,355 9,802 14,776 11,503 12,522 12,839 15,837 14,641 11,531 10,154 8,964 8,446	146 165 174 236 169 133 116 162 111 180 139 123	576 603 1,632 1,318 1,361 1,271 1,068 1,178 1,024 1,101 1,072 1,049	321 175 384 448 597 644 498 462 543 639 494 552	226 125 446 459 505 341 337 353 214 413 440 219	11,960 13,508 22,609 18,328 21,130 19,801 22,199 20,575 17,068 16,314 15,002 14,262	24.9 28.1 47.1 38.2 44.0 41.3 46.2 42.9 35.6 34.0 31.3 29.7	19,677 27,728 51,825 52,790 43,906 50,284 44,054 48,055 38,759 37,052 38,474 35,378	41.0 57.8 108.0 110.0 91.5 104.8 91.8 100.1 80.7 77.2 80.2 73.7
1970° Jan	2,341 2,461 2,674 2,373 1,978 1,745 2,315 1,506 1,875 957 2,350 1,770	27 40 46 24 46 37 23 28 12 39 14	21,110 19,901 19,971 15,040 19,803 15,552 19,856 14,505 14,505 14,867 21,666 15,558	1,796 1,527 2,338 2,098 3,119 2,894 3,012 1,821 1,821 1,139 1,326 909	25,274 23,929 24,975 19,535 24,946 20,228 25,206 18,213 17,002 25,356 18,277	52.7 49.9 52.0 40.7 52.0 42.1 52.5 37.9 37.9 35.4 52.8 38.1	535 503 606 603 823 1,014 1,167 801 801 746 534 368	284 74 238 121 109 154 193 197 197 141 209	3,378 2,312 3,287 1,927 3,374 2,493 2,443 1,968 1,968 2,268 2,774 2,709	175 131 196 129 419 324 229 182 182 213 273 222	12,918 10,899 12,244 99,181 9,707 12,056 13,696 11,325 11,325 10,065 17,551 9,125	133 144 146 136 123 110 135 97 97 132 101 99	1,153 1,008 1,093 835 1,179 1,051 1,228 938 938 938 889 1,081	598 466 647 653 837 728 901 686 686 620 640 656	366 327 362 320 303 394 328 225 225 359 329 427	19,540 15,864 18,819 14,905 16,874 18,324 16,902 16,419 16,419 15,433 23,492 14,638	40.7 33.0 39.2 31.1 35.2 38.2 35.2 34.2 34.2 32.2 48.9 30.5	44,814 39,793 43,794 34,440 41,820 38,552 34,745 34,632 34,632 32,435 48,848 32,915	93.4 82.9 91.2 71.7 87.1 80.3 72.4 72.1 72.1 67.6 101.8 68.6
1971 ⁹ Jan	1,974	27	15,714	1,357	19,072	39.7	544	112	2,946	262	13,192	125	854	730	423	19,188	40.0	38,260	79.7

¹ Includes tapestry and upholstery fabrics, tire cord fabrics, and cloths in chief value cotton containing other fibers. ² Includes velvets and velveteens, corduroys, plushes and chenilles, and manufactures of pile fabrics. ³ Includes blankets, quilts, and bedspreads, sheets and pillow cases ⁴ Includes kinit and woven underwear and outerwear (collars and cuffs, shirts, coats, vests,

robes, pajamas, and ornamented wearing apparel). ⁵ Includes nets and nettings, veils and veilings, edgings, embroideries, etc., and lace window curtains. ⁶ Includes braids (except hat braids), tubing, labels, lacing, wicking, loom harness, table and bureau covers, polishing and dust cloths, fabrics with fast edges, cords and tassels, garters, suspenders and braces, corsets and brassieres, etc. ⁷ Includes

belts and belting, fish nets and netting, and coated, filled or waterproof fabrics. 8 480 pound net weight bales. 9 Preliminary.

Table 16.—Raw cotton equivalent of U.S. exports of domestic cotton manufacturers, 1965 to date

	T		Yarn, thr	ead, twine,	and cloth						N	Nanufactur	ed product	:s					
Year		Sewing		Clo	oth	То	tal		House fur	nishings		Wearing	apparel			То	tal	Tot	al
and month	Yarn	thread crocket, darning and em- broidery cotton	Twine and cordage	Standard construc- tions and tire cord ¹	Other ²	Weight	Bales	Blan- kets	Quilts, spreads, pillow cases, and sheets	Towels	Other ³	Knit⁴	Other ⁵	Other house hold and clothing arti- cles ⁶	Indus- trial prod- ducts ⁷	Weight	Bales	Weight	Bales
	1,000 pounds	1,000 pounds	1,000 pounds	1,000 pounds	1,000 pounds	1,000 pounds	1,000 bales ⁸	1,000 pounds	1,000 pounds	1,000 pounds	1,000 pounds	1,000 pounds	1,000 pounds	1,000 pounds	1,000 pounds	1,000 pounds	1,000 bales ⁸	1,000 pounds	1,000 bales ⁸
1965 1966 1967 1968 1969	7,104 6,518 5,737 4,442 37,432 15,178	1,832 2,049 1,806 1,754 1,821 1,641	1,237 1,303 1,342 1,464 1,193 920	85,509 95,473 86,244 79,302 85,344 85,458	24,792 27,370 33,553 35,900 32,827 28,473	120,474 132,713 128,682 122,862 158,617 131,670	251.0 276.4 268.1 256.0 330.5 274.3	851 724 691 593 523 597	4,955 5,128 5,885 5,671 4,670 4,665	6,370 6,514 6,435 5,536 5,176 5,289	2,838 3,037 3,104 3,878 3,686 3,620	2,838 2,962 2,694 2,809 2,756 2,770	15,197 17,451 20,458 24,666 33,014 27,200	9,953 10,155 11,216 11,914 12,081 10,661	10,256 10,842 9,234 10,271 11,540 12,932	53,258 56,813 59,717 65,338 73,446 67,734	111.0 118.4 124.4 136.1 153.0 141.1	173,732 189,526 188,399 188,200 232,063 199,404	361.9 394.8 392.5 392.1 483.5 415.4
1969 Jan	300 471 3,749 3,291 5,728 3,904 2043 2,066 902 2,255 5,538 7,185	79 128 188 181 179 168 112 145 190 177 115	36 108 149 125 124 147 58 110 82 93 75 88	3,103 5,794 8,060 7,104 6,672 6,210 7,114 7,590 8,606 7,997 10,019 7,077	300 893 4,808 3,374 3,382 3,093 2,027 3,116 2,846 3,708 3,037 2,245	3,818 7,394 16,954 14,075 16,085 13,522 11,354 13,027 12,626 14,230 18,784 16,753	8.0 15.4 35.3 19.3 33.5 28.2 23.7 27.1 26.3 29.6 39.1 34.9	28 23 42 75 35 46 37 47 51 63 48 29	209 160 526 454 473 432 313 447 405 449 426 378	171 203 659 377 506 445 432 414 500 586 458 426	200 234 488 491 355 223 231 346 225 263 309 322	179 185 307 226 261 225 238 251 243 250 202 185	1,557 1,492 4,315 3,125 4,064 2,821 2,747 2,145 2,142 2,634 2,622 3,351	682 924 1,714 1,057 894 819 1,257 1,242 1,161 877 731	533 473 1,112 1,041 1,134 9953 943 1,188 1,146 1,107 930 980	3,559 3,694 9,163 6,846 7,722 5,964 6,198 6,080 5,873 6,229 5,726 6,395	7.4 7.7 19.1 14.3 16.1 12.4 12.9 12.7 12.2 13.0 11.9 13.3	7,377 11,088 54,4 20,921 23,807 19,486 17,552 19,107 18,499 20,459 24,510 23,148	15.4 23.1 43.6 49.6 40.6 36.6 39.8 38.5 42.6 51.1 48.2
1970° Jan	3,301 2,345 2,548 2,849 1,634 325 220 288 363 392 465 448	121 148 126 133 118 116 125 135 150 185 153 131	108 34 102 73 59 110 75 71 59 61 101	7,293 6,852 8,841 7,297 6,886 7,094 7,085 5,490 6,126 8,162 7,489 6,843	2,701 1,702 2,364 3,092 3,319 2,508 1,745 1,922 2,212 2,253 2,689 1,966	13,524 11,081 13,981 13,444 12,016 10,153 9,250 7,906 8,910 11,053 10,897 9,455	28.2 23.1 29.1 28.0 25.0 21.2 19.3 16.5 18.6 23.0 22.7 19.7	32 32 27 34 25 43 41 81 88 67 92 35	290 256 371 350 494 387 324 372 333 503 648 337	348 322 368 344 443 362 459 607 426 642 529 439	177 288 222 250 319 315 400 209 266 332 364 478	205 209 196 219 274 221 290 215 225 291 240 185	2,716 3,275 3,502 2,683 1,983 2,265 1,841 1,739 1,509 2,036 1,898 1,753	1,015 897 737 807 834 999 779 886 956 959 820	935 887 1,070 954 1,010 1,149 1,129 1,228 1,100 1,080 1,157 1,233	5,718 6,166 6,493 5,641 5,382 5,741 5,263 5,337 4,903 5,923 5,887 5,280	11.9 12.8 13.5 11.8 11.2 12.0 11.0 11.1 10.2 12.3 12.3	19,242 17,247 20,474 19,085 17,398 15,894 14,513 13,243 13,813 16,976 16,784 14,735	40.1 35.9 42.7 39.8 36.2 33.1 30.2 27.6 28.8 35.4 35.0 30.7
1971 ⁹ Jan	425	160	39	7,067	2,036	9,727	20.3	31	356	339	334	157	1,749	877	1,319	5,162	10.8	14,889	31.0

¹ Includes fabrics, tire cord, and cloth for export to the Philippines to be embroidered and otherwise manufactured and returned to the United States. ²Includes tapestry and upholstery fabrics, table damask, pile fabrics and remnants. ³Includes curtains and draperies, house furnishings not elsewhere specified. 4 Includes gloves and

mitts of woven fabric. 5 Includes underwear and outerwear of woven fabric, handkerchiefs, and wearing apparel containing mixed fibers (corsets, brassieres, and girdles, garters, armbands and suspenders, neckties and cravats). 6 Includes canvas articles and manufactures, knit fabric in the piece, braids and narrow fabrics, elastic webbing, waterproof garments, and lace and lace articles. ⁷Includes ribberized fabrics, bags, and industrial belts and belting. 8 480 pound net weight bales. 9 Preliminary.

Table 17.—Man-made fiber equivalent of U.S. imports for consumption of man-made fiber manufactures, 1965 to date

						maii made	TIDEI IIIali	unactures,	1505 to							
			Tops, yar	n, thread,	and cloth					Primari	ly manuf	factured pr	oducts			
Year and month	Sliver	Yarns		Sewing thread	Rayon tire			Wearing	apparel	Handker-	Laces and	Narrow	Knit	Other		Total manu- fac- tured
	tops and roving	thrown or plied	Yarns spun	and hand- work yarns	fabric includ- ing cord fabric	Fabric woven	Total	Knit ¹	Not knit	chiefs	lace arti- cles ²	fabrics ³	fabric in the piece	manu- fac- tures ⁴	Total	imports
								1,000	pounds							
1965 1966 1967 1968 1969	53 759 147 70 780 1,790	279 926 4,604 11,032 4,510 10,449	503 2,596 3,957 6,526 10,848 11,114	389 334 328 709 700 2,569	569 1,739 990 5,298 3,419 2,120	26,094 44,198 32,714 38,086 48,322 54,989	27,887 50,552 42,740 61,721 68,579 83,031	12,832 18,788 30,692 50,310 76,851 96,583	17,749 19,636 30,194 41,019 66,696 91,337	217 189 170 182 507 346	1,587 2,119 2,185 2,344 2,778 4,783	4,960 4,132 4,057 4,752 5,292 5,327	2,634 3,370 4,441 5,169 7,213 19,615	11,166 24,279 24,339 27,828 29,544 28,370	96,078 131,604 188,881	79,032 123,065 138,818 193,325 257,460 329,392
1969 Jan. Feb. Mar. Apr. May June July Aug, Sept. Oct. Nov.	16 6 108 31 63 56 54 76 158 83 37 91	96 513 258 262 286 272 129 578 352 807 552	518 958 1,282 1,041 16,56 829 1,090 618 781 826 641 609	24 52 59 59 36 63 39 75 61 82 63 88	47 129 732 1,086 763 79 00 109 245 1	2,023 3,288 4,433 4,663 4,148 4,237 4,768 4,116 4,647 4,650 3,750	2,724 4,946 6,872 7,142 6,952 5,536 6,080 5,572 6,244 6,449 5,225	2,658 4,307 5,184 5,033 6,409 8,243 9,618 8,894 7,980 8,597 4,897	3,601 4,821 6,012 4,764 4,791 5,816 7,153 6,444 6,033 5,896 4,720	19 25 44 37 39 54 56 35 48 64	103 132 123 193 222 193 325 328 310 404 266	227 344 692 571 570 435 438 392 438 442 411	715 541 513 586 540 452 509 584 596 607 688	2,202 1,922 2,951 2,474 2,979 2,669 2,749 2,852 2,667 2,555 1,826	9,525 12,092 15,519 13,658 15,480 17,862 20,848 19,619 18,565 12,861	12,249 17,038 22,391 20,809 22,432 23,398 26,928 25,191 24,316 25,014 18,086
Dec. 1970 5 Jan. Feb. Mar. Apr. May June July Aug. Sept. Oct. Nov. Dec.	127 43 265 373 275 88 143 149 155 58 104	394 449 954 898 1,001 1,105 1,002 953 767 1,129 936 861	1,070 673 1,348 1,220 838 1,126 1,073 1,139 631 573 642 781	182 168 102 231 197 269 288 188 231 218 215 280	203 138 450 363 488 41 103 147 40 146	4,830 3,006 4,842 4,701 4,352 4,527 4,966 5,274 4,745 5,133 4,187 4,426	4,900 6,806 4,477 7,961 7,786 7,151 7,156 7,473 7,806 6,676 7,151 6,230 6,358	5,011 5,050 5,852 6,104 7,261 9,609 10,607 11,113 9,900 9,710 7,538 8,828	8,060 6,783 7,274 6,378 6,322 7,721 8,902 9,225 8,655 8,007 6,665 7,345	57 48 34 27 17 29 24 20 16 20 26 28	232 148 189 226 219 376 512 629 663 730 512 347	548 347 488 502 431 480 436 425 462 358 377 473	1,094 836 1,299 1,309 1,307 1,626 1,636 1,541 1,747 2,128 2,497 2,595	2,238 2,006 2,207 2,366 2,197 2,024 2,303 2,745 2,767 2,662 2,783 2,072	14,768 17,240 15,218 17,343 16,912 17,754 21,865 24,420 25,698 24,210 23,615 20,398 21,688	24,046 19,695 25,304 24,905 29,021 31,893 33,504 30,886 30,766 26,628 28,046
1971 ⁵ Jan	43	744	786	430	209	5,552	7,764	8,829	8,255	22	257	446	3,437	2,359	23,605	31,369

¹ Includes gloves, hosiery, underwear, outerwear, and hats. ² Includes veils and veilings, nets and nettings, lace window curtains, edgings, insertings, flouncings, allovers, etc., embroideries, and ornamented wearing apparel. ³ Includes braids (except hat braids), fabrics with fast edges not over 12 inches wide, garters, suspenders, braces, tubings, cords, tassels, gill nets, webs, seines, and other nets for fishing. ⁴Not elsewhere classified. ⁵ Preliminary.

		То	ps, yarn, th	read, and o	cloth				Prima	rily manufa	ctured pr	oducts			
Year and month	Sliver tops and roving ¹	Yarns spun	Sewing thread and hand- work yarns	Tire cord and tire cord fabric	Cloth woven	Total	Hosiery	Under- wear and night- wear	Outer- wear	House furnish- ings	Knit or cro- cheted fabrics	Narrow fabrics ²	Other manu- factures ³	Total	Grand total
							1,	000 pound	ds			•	•		
1965	4,809 6,384 4,500	2,451 1,481 2,141	364 528 465	24,982 26,742 16,460	62,739 66,379 67,758	95,345 101,514 91,324	766 888 1,146	2,462 2,456 1,978	4,169 4,209 4,831	4,521 6,418 8,766	5,252 5,754 6,796	2,535 3,299 4,080	14,006 15,438 14,057	33,711 38,462 41,654	129,056 139,976 132,978
1968	5,042 6,002 5,644	2,872 5,286 5,357	540 683 1,380	9,794 9,609 8,313	65,372 69,736 67,871	83,620 91,316 88,565	1,303 1,403 1,038	2,111 2,327 2,162	6,316 8,891 9,602	10,406 10,441 12,455	6,683 9,138 12,146	4,543 4,266 4,131	14,012 18,448 17,327	45,374 54,914 58,861	128,994 146,230 147,426
1969 January February	265 369	202 342	31 43	611 655	2,650	3,759	75	127	552	435	271	197	936	2,593	6,352
March April	297 513	606 519	87 80	1,465 1,402	3,986 8,400 7,177	5,395 10,855 9,691	75 129 170	132 299 205	684 980 902	536 1,239 1,000	247 597 676	238 479 392	1,172 1,969 1,922	3,084 5,692 5,267	8,479 16,547 14,958
May June July	558 563 474	309 374 282	50 51 58	623 503 1,102	7,012 5,698 5,197	8,552 7,189 7,113	111 162 85	188 143 168	842 716 735	745 812 943	710 756 672	435 338 280	1,748 2,194 1,313	4,779 5,121 4,196	13,331 12,310 11,309
August	872 720 424	496 483 495	66 50 64	862 783 846	6,312 5,082 6,855	8,608 7,118 8,684	105 116 123	235 203 261	753 652 813	1,172 756 1,003	798 674 1,215	439 353 409	2,101 1,073 1,701	5,603 3,827 5,525	14,211 10,945
November December	493 453	640 539	58 46	431 325	5,560 5,673	7,182 7,036	139 113	207 161	674 588	971 830	1,310 1,214	472 235	1,216 1,175	4,989 4,316	14,209 12,171 11,352
1970 ⁴ January	623	553	87	739	4,832	6,834	110	159	571	1 104	1.000	212	1.500	4 000	
February March	400 503	439 544	38 81	408 651	6,039 6,604	7,324 8,383	117 120	232 168	695 773	1,184 1,141 1,077	1,069 1,026 1,108	313 277 341	1,580 1,353 1,453	4,986 4,841 5,040	11,820 12,165 13,423
April	471 431 397	476 528 455	43 161 333	639 684 550	5,988 5,790 6,277	7,617 7,594 8,012	91 58 70	194 193 175	869 819 862	1,181 957 921	920 926 1,096	278 428 333	1,689 1,531 1,593	5,222 4,912 5,050	12,839 12,506 13,062
July	573 544 228	357 334 248	334 70 72	615 792 760	4,581 4,654 5,505	6,460 6,394 6,813	72 99 80	149 211 158	775 862 860	894 1,570 935	720 857 953	287 407 429	1,348 1,301 1,080	4,245 5,307	10,705 11,701
October	644 421 409	357 482 584	81 47 33	1,375 542 558	5,986 6,131 5,484	8,443 7,623 7,068	83 70 68	204 205 114	862 874 780	896 808 891	1,223 1,144 1,104	456 300 282	1,080 1,516 1,417 1,466	4,495 5,240 4,818 4,705	11,308 13,683 12,441 11,773
1971 ⁴ January	481	608	40	654	5,527	7,310	36	118	727	903	1,148	429	1,624	4,985	12,295

¹ Includes products made from waste. ² Includes ribbons, trimmings, and braids (except hat braids). ³ Not elsewhere classified. ⁴ Preliminary.

Table 19.—Textile fabrics: Deliveries to U.S. military forces, raw fiber content, by major fiber, by months 1969 to date

			Cotto	on					Wool		
Year and month	100 percent		ton and r fiber mix	man-made ktures	Tota	ı p	100 ercent		nd man-ma r mixtures	de	Total
	cotton fabric	orr	ercent nore ton	Less than 50 percent cotton			wool fabric	50 percen or more wool		cent	rotai
					1,	000 poun	ds			<u> </u>	
1969 January February March April May June July August September October November December	4,365 6,028 7,366 6,639 8,0916 2,8210 2,210 3,285 4,223		195 249 266 117 57 180 266 44 255 351	48 67 82 80 59 80 73 42 38 705 127	4,604 6,341 7,513 8,417 7,298 2,161 3,862 4,72	4465636405	239 312 487 368 121 204 448 792 1,064 1,062	000000000000000000000000000000000000000		0 14 10 17 65 86 49 17 17 34 34	239 326 497 385 248 207 253 455 809 1,096 1,680
Total	57,833	1,9	952	871	60,65	6	6,926	0	3	67	7,293
1970 January February March April May June July August September October November December	4,739 4,846 4,063 2,870 2,2710 801 866 510 4080 2,75		323 356 222 224 287 323 394 2209 372	156 46 100 70 32 37 24 0 0	5,21 5,24 4,38 3,162 2,54 1,14 1,26 69 54	8 5 4 9 0 8 0 5 7 2	1,591 985 1,131 998 655 643 313 227 216 106 31	00005000000	11 22 11 11 11 11 11 11 11 11 11 11 11 1	33 882 77 96 11 41 09 43 65 41 68 22	1,824 1,168 1,308 1,294 699 801 752 355 292 257 174
Total	24,678	3,4	176	465	28,61	9	7,484	5	1,4	44	8,933
1971 January	117	;	349	o	46	6	-4	0	;	13	9
		_	·····		Man-	made	-				
	(Cellulosic		No	n-cellulos	ic		Total			Total all fibers
	Filament yarn	Staple fiber	Total	Filament yarn	Staple fiber	Total	Filament yarn	Staple fiber	Total	Glass	110013
				•	1,	000 pour	ıds				
1969 January February March April May June July August September October November December	00 1 00 1 00 0 152 2	000000000000000000000000000000000000000	0 0 1 0 0 1 0 0 15 4 2	1,278 689 1,105 987 491 1,031 509 393 370 450 448 630	166 241 126 179 171 391 201 90 92 344 460 496	1,444 1,231 1,166 662 1,422 710 483 462 7908 1,126	1,278 689 1,106 987 491 1,032 509 393 370 465 450 632	166 241 126 179 171 391 201 90 92 344 462 496	1,444 930 1,232 1,1662 1,423 710 483 462 809 912 1,128	41 0 24 64 -1 15 16 3 2 6	6,332 7,600 9,267 8,451 9,324 8,907 3,961 3,250 3,458 5,519 5,879 7,553
Total	21	2	23	8,381	2,957	11,338	8,402	2,959	11,361	191	79,501
1970 January February March April May June July August September October November December	41 0 8 0 0 0 0 0	0 0 1 0 1 1 1 1 0 0	1 41 0 9 0 1 1 1 1 0 0	841 645 639 594 208 240 145 21 175 -30	728 6012 7514 5116 5304 424 310 247 449 211	1,569 1,151 1,251 1,348 724 7749 445 485 217 452 213	842 686 639 602 208 240 145 -31 -33 2	728 605 612 755 516 531 505 425 311 247 449 211	1,570 1,291 1,251 1,357 724 771 650 446 486 217 452 213	5 1 10 3 3 0 0 1 0 0 0	8,617 7,708 6,954 5,818 4,455 4,152 2,550 2,062 1,513 1,091 1,318 765
Total	50	5	55	3,483	5,890	9,373	3,533	5,895	9,428	23	47,003
1971											

Based on data from the Defense Supply Agency, Department of Defense.

Fiber and		1969								1970						1	1971
fabric	Nov.	Dec.	Total ¹	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.	Total	Jan.
COTTON								Thous	sand squa	re yards		· · · · · · · · · · · · · · · · · · ·	•				
Airplane cloth Artificial leather Balloon cloth Bedspread Broadcloth Bunting Chambray Cheesecloth Damask Denim Dirill Duck Flannel Wuslin Dsnaburg Dxford Copplin Sateen (satin)	0 26 224 59 25 118 10 0 834 0 1497 1,797	05 119 20 19 10 121 7 00 571 294 220 2,186 2,463	57 53 1,425 193 0 176 74 1,453 182 25 35 10,064 38 46 2,104 2,234 57,444 19,240	4 0 1,016 18 0 0 0 131 24 0 0 808 12 0 191 373 1,443 2,678	0 236 0 0 17 11 122 8 0 937 0 8 160 3,756	12 0 742 0 0 0 0 80 10 102 0 1,020 0 232 339 312 2,537	9 4 -39 9 0 0 157 4 0 0 581 3 0 236 130 1,716	0 0 185 37 0 10 38 136 9 0 945 144 23 107 150 1,133	1 0 118 30 0 3 0 233 23 0 0 435 264 462 843	6 35 166 111 0 5 0 88 3 0 0 55 0 0 68 0 126	1 1 0 5 0 0 95 18 0 0 164 0 30 30	2 0 0 -1 0 0 0 0 4 2 0 0 0 0 0 0 0 0 0 0 0 0 0 0	10 0 0 1 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0	0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0	9 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0	54 40 2,424 110 30 34,995 1,046 141 102 0 4,995 37 1,253 2,512 3,267 12,906	000000000000000000000000000000000000000
(sheets) Terry and toweling Ticking Twill Other broad-	192 188 0 191	484 292 0 36	5,444 3,051 26 1,524	688 448 0 119	681 322 0 16	1,269 334 0 23	1,281 442 0 37	1,012 268 0 0	301 0 31	1,212 160 0 0	1,377 183 0 76	1,202 65 0 0	1,089 0 0 22	825 0 13 0	568 0 0 110	12,905 2,523 13 434	325 0 0 10
woven fabrics Nebbing Knit	33 135 1	50 110 0	192 744 267	51 168 0	47 73 31	45 87 44	49 35 57	3 9 0	3 10 22	21 14 0	0 3 0	0 9 0	0 4 0	0 4 0	0 6 0	219 422 154	0 2 0
Total cotton MAN-MADE	5,471	6,997	106,091	8,172	8,001	7,188	4,879	4,690	4,488	1,970	2,064	1,360	1,208	913	738	45,671	337
Cellulosic																	
Broadwoven fabrics Vebbing	10	7 0	76 1	2	175 0	1 0	0	0	1	0	0	0	0 0	0	0	179 0	0
Non-cellulosic																	
Ballistic Sunting Duck Netting Sylvan Parachute cloth Fwill Other Webbing Knit cloth	378 13 43 0 7 349 14 9	529 5 126 0 3 158 20 9	7,856 100 427 865 1,264 41 514 336 120 87	753 85 0 3 290 44 20	666 7 24 0 20 124 13 5	590 92 0 27 330 86 9	559 74 0 13 16 42 43 9	195 0 0 0 19 184 14 6	151 0 156 0 0 68 11 3	0 204 0 0 2 34 25 1	0 0 38 0 0 0 13 0	197 1 0 0 0 52 0 0	0 -66 0 0 0 0	0 0 0 0 0 31 10 0	0 3 0 0 0 0 0 0 8 0 0	3,111 20 607 33 73 0 1,268 254 53 0	0 0 23 0 0 0 0 8 0
Total non- cellulosic	813	850	11,610	1,203	865	1,134	857	418	389	266	51	250	-66	41	11	5,419	31
Glass	15	38	225	15	1	16	11	3	0	0	5	0	0	0	0	51	0
Total man- made	829	895	11,912	1,220	1,041	1,151	868	421	390	266	56	250	-66	41	11	5,649	31

¹ January-December.

Based on data from the Defense Supply Agency, Department of Defense.

Table 21.—Wool and fiber mixture fabrics: Deliveries to U.S. military forces, in equivalent square yards of fabric, November 1969 to date

Fiber and		1969								1970							1971
fabric	Nov.	Dec.	Total	Jan.	Feb.	Mar.	Apr.	May	June	July	Aug.	Sept.	Oct.	Nov.	Dec.	Total	Jan.
WOOL								Thouse	and squar	e yards							
Blanketing Flannel Gabardine Melton Serge Tropical Other	311 14 265 218 711 0	1,010 0 365 174 611 0	1,915 118 1,396 1,983 4,441 82 12	876 0 165 176 895 0	503 5 92 176 544 0	513 2 195 210 669 0	245 0 539 137 554 0	118 0 446 96 243 0	81 0 169 122 614 0	0 0 365 127 522 0	0 0 116 35 344 0	0 9 71 96 174 0	0 0 0 105 223 0	0 0 74 82 0	0 0 0 25 0 0 2	2,336 16 2,158 1,379 4,864 0	0 0 0 0 -6 0
Total wool MIXED FIBER	1,519	2,160	9,947	2,112	1,320	1,589	1,475	903	986	1,014	495	350	328	156	27	10,755	-6
Cotton and cellulosic	6 1,764 223 20	0 2,089 192 0	7 13,640 1,993 21	0 2,249 1,289	0 1,564 978	0 1,546 1,010	26 1,511 1,764	1 1,423 673	7 1,611 868	4 1,287 692	4 1,402 272 0	3 803 412	0 864 252	1,445 442	0 1,120 -97 0	45 16,825 8,555	0 1,463 57
Total mixed fiber			15,661	3,538	2,542	2,556	3,301	2,097	2,486	1,983	1,678	1,218	1,116	1,887		25,425	1,520
COTTON AND NON-CELLULOSIC		226	4 220	220	100	405	505	107	261	225					_		
Broadcloth Duck Oxford Poplin Sateen Twill Tropical Other broadwoven	212 0 338 78 703 276 152	236 0 150 279 847 261 285	4,339 325 2,079 448 3,254 998 1,879	338 0 480 517 206 320 343	128 0 223 298 684 0 228	425 0 201 153 433 255 80	505 0 494 348 71 90	137 0 0 560 562 56 0	361 0 0 736 399 10 0	335 0 0 0 828 124 0	0 0 0 0 1,003 399	0 0 0 566 237 0	0 0 84 305 474 0	0 0 0 720 725 0	0 0 173 377 570	2,229 904 3,015 6,431 3,241 741	0 0 374 488 601 0
fabrics Webbing	0 4	27 3	298 22	40 4	0 4	0	0 3	107 0	106 0	0	0	0	0	0	0 0	253 11	0
Total cotton and non-cellulosic	1,763	2,088	13,642	2,248	1,565	1,547	1,511	1,422	1,612	1,287	1,402	803	863	1,445	1,120	16,825	1,463

¹ January-December.

Based on data from the Defense Supply Agency, Department of Defense.

Table 22.—American upland cotton: Carryover, ginnings, supply, disappearance, and CCC inventory, by staple length, 1961-70

	and C	CC inventory,	by staple len	gth, 1961-70			
Year beginning August 1	Shorter t	han 1 inch	1 inch and	$1^{1}/_{32}$ inches	$1^{1}/_{16}$ inche	es and over	All staple lengths
Year Deginning Adgust 1	Quantity	Percentage of total	Quantity	Percentage of total	Quantity	Percentage of total	Quantity
	1,000 bales	Percent	1,000 bales	Percent	1,000 bales	Percent	1,000 bales
				Carryover			
1961	598 1,378 2,855 3,686 4,339 5,932 4,921 2,189 821 329	9 18 26 31 31 36 40 35 13	3,030 2,154 3,189 4,253 4,576 5,791 4,244 1,641 1,281	43 28 29 35 33 35 35 26 20 18	3,450 4,193 4,961 4,171 5,103 4,842 3,105 2,416 4,245 4,278	48 54 45 34 36 29 25 39 67 76	7,078 7,725 11,005 12,110 14,018 16,565 12,270 6,246 6,347 5,609
				Ginnings			· · · · · · · · · · · · · · · · · · ·
1961 1962 1963 1964 1965 1966 1967 1967 1968 1969	3,854 3,842 3,872 3,439 3,999 2,556 1,705 1,635 1,684 1,970	27 26 26 23 27 27 27 23 15 17 20	3,075 3,645 4,199 4,338 3,555 1,642 1,109 1,707 1,590 1,528	22 25 28 29 24 17 15 16 16	7,334 7,267 7,058 7,255 7,293 5,293 4,556 7,496 6,593 6,562	51 49 46 48 49 56 62 69 67 65	14,263 14,754 15,129 15,032 14,847 9,491 7,370 10,838 9,867 10,060
[Supply ²			
1961 1962 1963 1964 1965 1966 1967 1968 1969	4,452 5,220 6,729 7,126 8,338 8,488 6,626 3,824 2,505 2,299	21 23 26 26 29 33 34 22 15	6,105 5,799 7,388 8,591 8,131 7,433 5,353 3,348 2,871 2,530	29 26 28 32 28 28 27 20 18	10,784 11,460 12,017 11,426 12,397 10,135 7,662 9,913 10,838 10,840	50 51 46 42 43 39 39 58 67	21,341 22,479 26,134 27,143 28,866 26,056 19,641 17,085 16,214 15,669
1961				Disappearance ³			
1961 1962 1963 1964 1965 1966 1967 1968	3,074 2,365 3,042 2,786 2,405 3,567 4,436 3,003 2,176	23 21 22 21 20 26 33 28 20	3,951 2,610 3,135 4,015 2,341 3,189 3,712 2,067 1,869	29 23 22 31 19 23 28 19	6,591 6,499 7,846 6,323 7,554 7,030 5,246 5,667 6,560	48 56 56 48 61 51 39 53	13,616 11,474 14,023 13,124 12,300 13,786 13,394 10,737 10,605
1061			(CCC Inventory			
1961 1962 1963 1964 1965 1966 1967 1968 1969	3 678 2,300 3,362 3,904 4,814 3,900 6 93 2	(4) 14 19 33 34 40 70 11 3 (4)	211 1,127 1,970 3,099 4,033 4,513 1,390 14 466 129	15 24 24 30 36 37 25 25 17	1,232 2,883 3,746 3,771 3,460 2,750 310 37 2,240 2,826	85 62 47 37 30 23 5 64 80	1,446 4,688 8,017 10,232 11,397 12,077 5,600 57 2,799 2,937

¹Preliminary. ²Carryover at beginning of season, plus ginnings. ³Supply minus carryover at end of season. ⁴Less than 0.5 percent.

Compiled from reports of Consumer and Marketing Service and Agricultural Stabilization and Conservation Service.

Table 23.-Commodity Credit Corporation stocks of cotton, United States, August 1, 1969 - July 31, 1970

	able 23.—Commounty	Credit Corpo	Tation stocks			9.51 1, 1005		
	Date	Total		Upland		E	xtra-long staple	1
			Owned ²	Under Ioan	Total	Owned ³	Under loan	Total
					1,000 bales			
1969					4 = 0.0			
August	1	2,911	2,799 2,799		2,799 2,799	112 112		112
August August	8	2,911 2,911	2,799		2,799	112		112 112
August	22	2,911	2,799	6	2,805	106		106
August	29	2,931	2,793	39	2,832	99		99
September	5	2,936	2,786 2,786	56 65	2,842 2,943	94 92		94
September September		3,035 2,938	2,775	72	2,847	91		92 91
September		2,941	2,775	77	2,852	89		89
October	3	2,881	2,700	94	2,794	87		87
October	10	2,910	2,700	123	2,823	87		87
October	17	2,939	2,653	200 318	2,853 2,971	86 85	(4)	86
October October	24	3,056 3,162	2,653 2,558	519	3,077	85	\4\frac{1}{3}	85 85
November	7	3,374	2,558	730	3,288	85	` 1	86
November	14	3,422	2,333	1,004	3,337	83	2	85
November	21	3,736	2,333	1,317	3,650	83	3	86
November	28	3,859	2,237 2,237	1,534 1,749	3,771 3,986	83 83	5 9	88
December December	5	4,078 4,215	2,237	1,982	4,124	82	9	92 91
December	19	4,421	2,142	2,188	4,330	82	9	91
December	26	4,509	2,112	2,306	4,418	81	10	91
1970								
January	2	4,590	2,112	2,387	4,499	81	10	91
January	9	4,998 5,179	2,105 2,105	2,799 2,983	4,904 5,088	78 72	16 19	94 91
January January	16	5,229	2,103	3,035	5,136	71	22	93
January	30	5,240	3,101	3,045	5,146	71	23	94
February	6	5,236	2,086	3,055	5,141	71	24	95
February	13	5,222	2,086	3,040	5,126	71	25	96
February February	20	5,158 5,095	2,063 2,063	2,997 2,934	5,060 4,997	71 71	27 27	98 98
March	6	5,049	2,045	2,905	4,950	71	28	99
March	13	4,996	2,045	2,853	4,898	71	27	98
March	20	4,885	2,019	2,769	4,788	71	26	97
March	27	4,815	2,019	2,700	4,719 4,646	71 71	25 25	96 96
Aprıl Aprıl	3	4,742 4,673	1,999 1,999	2,647 2,579	4,578	71	24	95
April	17	4,606	1,994	2,517	4.511	72	23	95
April	24	4,522	1,994	2,435	4,429	72	21	93
May	1	4,434	1,980	2,362	4,342	72	20	92
May	8	4,313	1,980	2,243	4,223	72	18 17	90 89
May May	15	4,215 4,137	1,968 1,968	2,158 2,081	4,126 4,049	72 72	16	88
May	29	4,045	1,954	2,003	3,957	72	16	88
June	5	3,962	1,954	1,921	3,875	72	15	87
June	12	3,817	1,928	1,803	3,731	72	14	86
June	19	3,711	1,928	1,700	3,628	71 71	12 9	83 80
June July	26	3,624 3,562	1,906 1.906	1,638 1,576	3,544 3,482	71	9	80
July	10	3,472	1,895	1,498	3,393	71	8	79
July	17	3,404	1,895	1,430	3,325	71	8	79
July	24	3,316	1,895	1,343	3,238	71	7	78 73
July	315	3,030	1,890	1,067	2,957	71	2	/3

¹ Includes American-Egyptian and Sea Island, ² Excludes cotton sold September 9 to date for delivery in the 1969 marketing Year, ³ Includes American-Egyptian cotton transferred to CCC

from the national stockpile. ⁴ Less than 500 bales. ⁵ Preliminary

Agricultural Stabilization and Conservation Service.

Table 24.-Cotton: American Middling White, spot prices in designated U.S. markets, loan rates, and prices received by farmers for upland cotton, August 1967 to date

Year beginning		Average	spot market prices	per pound	· · · · · · · · · · · · · · · · · · ·	Prices per pound received by
August 1	15/16 inch	1 inch	1-1/32 inches	1-1/16 inches	1-3/32 inches	farmers for upland cotton!
		(Cents	Cents		
1967	20.27	22.77	24.16	26.19	26.89	22.00
August	20.37		24.16		27.83	21.27
September	20.15	23.22		27.13	29.26	27.27
October	20.01	23.40	25.95	28.49	33.58	30.48
November	20.74	24.98	29.79	32.54		27.61
December	22.00	27.02	32.40	34.80	35.86	
January	21.17	26.19	30.60	33.12	33.99	22.45
February	20.42	25.40	29.30	31.87	32.80	20.45
March	20.29	25.21	28.75	31.39	32.30	20.29
April	20.14	25.06	28.45	30.86	31.75	20.22
May	20.17	24.93	28.18	30.32	31.25	21.59 21.12
June	20.32	24.83	20.07	30.14	31.04	
July	20.61	24.94	28.13	30.33	31.22	21.46
Average	20.53	24.83	28.22	30.60	31.48	² 25.39
Loan rates ³	17.81	20.36	21.61	22.91	23.76	⁴ 19.47
1968	01	05.05	00.00	30 50	21 47	00.00
August	21.11	25.05	28.30	30.59	31.47	26.00
September	21.20	24.97	28.09	30.34	31.17	26.36
October	5 21.24	24.29	26.89	28.98	29.74	26.50
November	20.55	23.27	25.17	27.01	27.66	24.10
December	19.95	22.67	24.37	26.27	26.85	21.53
January	19.68	22.47	24.16	26.12	26.67	19.37
February	19.49	22.21	23.76	25.65	26.16	19.70
March	19.33	22.09	23.66	25.61	26.10	20.57
April	19.23	21.99	23.56	25.60	26.05	20.68
May	19.46	21.93	23.51	25.66	26.11	20.12
June	19.54	21.89	23.51	25.64	26.10	21.32
July	19.53	21.92	23.57	25.67	26.13	21.65
Average	20.03	22.90	24.88	26.93	27.52	222.02
Loan rates ³ ,	17.79	20.34	21.84	23.84	24.54	4 19.69
1969						
August	19.24	21.59	23.19	25.24	25.75	20.51
September	19.05	21.43	22.96	24.98	25.54	19.39
October	19.39	21.68	23.17	24.99	25.55	21.70
November	19.79	21.94	23.37	25.07	25.58	21.36
December	20.50	22.02	23.35	24.92	25.38	19.95
January	20.23	22.00	23.25	24.83	25.28	19.09
February	20.31	22.11	23.35	24.90	25.36	20.73
March	20.36	22.19	23.46	24.89	25.35	21.14
April	20.59	22.44	23.70	25.11	25.52	21.61
May	20.76	22.60	23.83	25.23	25.64	22.12
June	21.04 21.22	22.78 22.96	23.98 24.20	25.39 25.59	25.80 25.99	22.14 22.47
-[
Average	20.17	22.15	23.49	25.09	25.57 24.64	20.94 ⁴19.71
	17.89	20.34	21.94	23.94	24.04	19.71
1970						
August	21.27	22.99	24.20	25.55	25.94	22.65
September	21.28	. 22.98	24.04	25.31	25.68	21.86
October	21.54	23.00	23.99	25.05	25.41	22.83
November	21.39	22.82	23.83	24.77	25.10	22.09
December	21.06	22.58	23.61	24.55	24.86	20.96
January	21.54	22.81	23.85	24.80	25.08	21.00
February	22.10	23.22	24.21	25.22	25.45	21.47
March						
April						
May						
June July						
Average						6
Loan rates ³	18.17	20.37	21.92	00.55	24.67	°22.4 ⁴20.15
				23.52		

¹Excludes domestic allotment payments, price support and diversion payments. ²Weighted average. ³Spot market loan rates exclude 14-point premium in 1965, 20-point premium in 1966, 30-point premium in 1967, 35-point premium in 1968, and 45-point premium in 1969 and 1970 for 3.5-4.9 micronaires. Spot prices are for cotton with micronaire

readings of 3.5 through 4.9. ⁴ Average of the crop. ⁵ Average of six markets, October 1968 to date. ⁶ Average price to Dec. 1,

Agricultural Stabilization and Conservation Service, Consumer and Marketing Service, and Statistical Reporting Service.

Table 25.—Cotton: Acreage, yield, and production in specified countries, average 1964-68, annual 1969 and 1970¹

		aver:	age 1964-68	, annual 196	9 and 1970				
Continent		Acreage			Yield		P	Production 2	
and country	Average 1964-68	1969	1970 ³	Average 1964-68	1969	1970³	Average 1964-68	1969	1970³
	1,000 acres	1,000 acres	1,000 acres	Pounds per acre	Pounds per acre	Pounds per acre	1,000 bales	1,000 bales	1,000 bales
NORTH AMERICA: United States Costa Rica El Salvador Guatemala Honduras Mexico Nicaragua	11,076 17 164 233 33 1,822 348	11,058 13 122 182 12 1,340 240	11,168 5 145 175 10 1,100 215	504 508 673 702 625 618 674	434 222 818 633 600 627 620	441 576 745 658 672 676 648	11,641 18 230 341 43 2,345 489	10,009 6 208 240 15 1,750 310	10,271 6 225 240 14 1,550 290
Total⁴	13,797	13,072	12,923	526	461	469	15,129	12,560	12,617
SOUTH AMERICA: Argentina Brazil Colombia Ecuador Paraguay Peru Venezuela	986 5,670 437 54 130 550	1,100 6,800 635 30 125 420 120	1,000 6,000 600 50 125 410 120	235 215 462 228 185 442 264	279 219 405 320 288 446 280	264 176 400 336 288 468 280	483 2,540 421 26 51 507 65	640 3,100 590 20 75 390	550 2,200 500 35 75 400 70
Total⁴	7,962	9,313	8,323	247	254	222	4,10	4,901	3,846
EUROPE: Bulgaria Greece Italy Spain Yugoslavia	117 342 29 444 24	115 375 20 340 28	115 330 20 240 30	295 514 248 385 240	313 653 192 374 240	313 640 192 480 224	72 366 15 356 12	75 510 8 265 14	75 440 8 240 14
Total⁴	1,016	938	795	398	460	481	843	892	797
U.S.S.R. (Europe and Asia):	6,060	6,300	6,500	711	678	798	8,980	8,900	10,800
AFRICA: Angola Cameroon Central Africa	98 205	135 265	135 225	201 199	320 254	320 128	41 85	90 140	90 60
Republic Chad Kenya Malawi Morocco Mozambique Nigeria Rhodesia South Africa,	275 737 154 76 43 906 840 103	300 750 150 85 45 800 1,000	300 750 150 85 50 800 1,000	106 119 56 145 368 96 117 377	136 128 58 198 267 120 192 461	144 112 58 198 288 120 96 461	61 182 18 23 33 181 204 81	85 200 18 35 25 200 400 240	90 175 18 35 30 200 200 240
Republic of Sudan Tanzania Uganda United Arab Republic	90 1,161 495 2,125 1,756	110 1,300 500 2,000 1,680	110 1,325 500 2,000 1,650	421 355 286 78 591	327 369 312 94 714	436 362 350 91 640	79 858 295 345 2,161	75 1,000 325 390 2,500	100 1,000 365 380 2,200
Total⁴	9,865	10,386	10,376	239	285	259	4,906	6,156	5,601
ASIA AND OCEANIA: Afghanistan Australia Burma China, Mainland India Iran Israe Israe Korea, Republic of Pakistan Southern Yemen Syria Thailand Turkey	310 577 500 12,080 19,706 890 75 48 4,059 45 662 222 1,733	300 78 350 12,300 19,400 940 75 82 45 4,345 40 700 150 1,575	300 80 350 12,500 19,400 790 75 85 45 4,400 40 675 55 1,350	175 876 699 2618 3149 9880 1950 2018 2018 2515 474	160 751 69 265 126 363 288 1,077 213 240 470 256 559	160 960 69 265 114 389 288 875 213 273 240 498 349 645	113 104 72 6,580 4,860 582 113 19 2,116 19 714 118 1,710	100 122 50 6,800 5,100 45 184 20 2,475 80 1,835	100 160 50 6,900 4,700 640 45 155 20 2,500 20 700 40
Total ⁴	40,498	40,417	40,180	203	215	212	17,104	18,154	17,735
World Total ⁴ Foreign Free World ⁴	79,255 49,778	80,504 50,586	79,177 48,749	310 230	308 245	312 230	51,157 23,853	51,685 25,858	51,496 23,408
Communist countries ⁴	18,401	18,860	19,260	409	403	444	15,677	15,818	17,818

 $^{^1\,\}mathrm{Harvest}$ season beginning August 1. $^2\,\mathrm{Bales}$ of 480 pounds net. $^3\,\mathrm{Preliminary.}$ $^4\,\mathrm{Includes}$ estimates for minor-producing countries not shown above and allowances for countries where data are not yet available.

Foreign Agricultural Service. Prepared or estimated on the basis of official statistics of foreign governments, other foreign source materials, reports of U.S. Agricultural Attaches and Foreign Service Officers, results of office research and related information. February 1971.

December 1970

January 1971

Cumulative totals since Aug. 1, 1970

Bureau of the Census.

Table 27.—Cotton: Average prices¹ of selected growths and qualities, c.i.f. Liverpool, England, 1968-70, and January 1970 to date

	M	1"				SM 1/16'	,			SM	1 1/8"
Year and month	U.S.	Pakistan 289F	U.S.	Mexico	Nicara- gua	Syria	U.S.S.R. Pervyl 31/32 mm.	Iran	Turkey (Izmir)	U.S.	Uganda BP 52
					Equivalent	U.S. cent	s per pound				
1968 1969 1970	28.22 25.53 27.46	28.28 27.15 29.61	33.07 28.47 29.67	30.89 28.45 30.71	29.40 26.70 28.45	32.29 ² 20.21 ² 29.26	32.22 29.39 32.47	32.00 28.52 29.22	31.14 27.88 28.35	34.85 29.97 31.32	37.74 33.55 33.15
1970 January February March April May June July August September October November December	26.50 26.62 27.00 27.31 27.40 26.95 27.06 27.31 28.16 28.82 27.83	27.89 29.55 29.55 29.75 29.44 29.75 29.40 28.84 29.00 29.76 30.85 31.40	28.75 28.81 29.00 29.31 29.40 29.45 29.70 29.75 30.26 30.70 30.58 30.39	29.65 29.56 29.80 30.02 30.14 30.21 30.49 30.96 31.38 31.64 32.16 32.50	27.52 27.20 27.45 27.90 27.81 27.75 27.92 28.20 29.15 29.66 30.38 30.50	228.60 228.60 228.75 228.88 228.81 229.00 229.15 29.44 29.77 30.48 30.80	31.58 31.15 32.15 31.99 31.75 31.44 31.53 33.75 33.75 34.00 33.50 33.50	28.50 28.62 28.75 28.75 28.75 28.75 28.80 29.25 29.25 29.25 29.54 30.31 31.17	27.50 27.50 27.40 27.78 28.32 28.14 27.94 28.06 28.62 28.87 29.36 30.75	30.25 30.31 30.50 30.81 30.90 31.20 31.50 32.01 32.45 32.28 32.09	31,55 32.06 32.25 32.25 32.62 32.75 33.60 32.69 34.20 34.31 35.00
1971 January³ February	28.85 29.68	31.57 32.02	30.95 31.52	33.00 33.44	30.50 30.85	30.80 30.96	32.92 32.69	32.05 32.22	30.92 30.88	32.75 33.21	35.42 36.62

¹ Generally for prompt shipment. ² Including War Risk surcharge. ³ Average of 3 quotations.

Foreign Agricultural Service.

Table 28.—Cotton: Average prices¹ of selected growths and qualities, c.i.f. Bremen, Germany, annual 1968-70, and January 1970 to date

	M Lt. Si	pot 1 1/32"			5	M 1 1/16	,,			SM :	1 1/8"
Year and month	U.S.	Brazil Type 4/5	U.S.	Mexico	Nicara- gua	Syria	U.S.S.R. Pervyi 31/32 mm.	Iran	Turkey (Izmir)	U.s.	Uganda BP 52
			.•		Equivalent	U.S. cents	s per pound				
1968 1969 1970	26.32 24.33 26.51	27.63 24.64 26.76	32.10 28.48 29.54	30.52 27.80 30.20	28.72 26.14 28.05	30.87 28.71 29.00	32.00 28.81 31.86	30.80 28.64 29.17	30.31 27.76 28.49	(⁴) 31.21 31.28	36.71 33.46 33.08
1970 January February March April May June July August September October November December ⁵	25.09 25.46 25.71 25.95 26.19 26.38 26.38 26.45 26.81 27.49 27.65 28.58	25.48 25.44 26.22 27.44 27.62 27.00 (⁴) (⁴) (⁴) (⁴) (⁴) 28.15	29.01 28.99 29.02 29.30 29.45 29.26 29.30 29.38 29.79 30.11 30.25 30.60	28.96 29.22 29.60 29.70 29.72 30.05 30.12 30.35 30.66 31.18 31.40 31.42	26.99 26.96 27.61 27.65 27.76 27.64 27.88 28.15 28.54 28.93 29.12 29.32	27.85 28.51 28.90 328.15 28.75 28.90 29.01 29.28 29.47 29.97 30.30	(4) (4) (4) (5) 31.07 31.15 31.15 31.15 32.40 32.68 32.83 32.35	29.12 28.98 28.48 28.80 28.89 28.87 (⁴) ³ 28.65 28.94 29.92 30.25	27.72 27.55 27.67 28.31 27.94 28.10 28.26 28.45 28.65 29.04 29.47 30.72	31.05 31.14 31.05 31.40 31.40 30.95 30.90 30.98 31.39 31.57 31.68 31.80	31.86 31.92 32.12 32.20 31.82 31.98 32.70 33.29 34.58 34.71 34.95 34.95
1971 January February	28.05 28.51	29.99 30.80	30.48 30.95	31.82 32.20	29.71 30.20	30.48 30.54	32.60 32.62	30.71 31.00	30.70 30.08	32.19 32.60	35.55 35.85

 $^{^1}$ Generally for prompt shipment. 2 Average of 3 quotations. 3 One quotation. 4 Not quoted. 5 Average of 2 quotations.

Foreign Agricultural Service.

Table 29.-Foreign spot prices per pound including export taxes¹ and U.S. average spot export prices, December 1970, January and February 1971

Market	Foreign		United States	
	Quality	Price per pound ³	Price per pound ⁴	Quality ⁵
		Cents		
		December 1970		
mbay, India	Digvijay, fine 7/8"	48.43	21.40	SLM 15/16"
rachi, Pakistan	289 F Sind Find S G	N.A.	22.23	SLM 1"
nir, Turkey	Standard II	26.07	25.57	M 1-1/16"
Paulo, Brazil	Type 5	29.95	21.83	SLM 31/32"
reon-Coahulla, Mexico	M 1-1/16"	628.76	25.57	M 1-1/16"
na, Peru	Tanguis type 5	29.73	⁷ 26.93	SLM 1-3/16"
exandria, UAR	Giza 66 good	30.55	⁸ 26.91	M 1-1/8"
		January 1971		
mbay, India	Digvijay, fine 7/8"	60.26	21.93	SLM 15/16"
rachi, Pakistan	289 F Sind Fine S G	N.A.	22.56	SLM 1"
nir, Turkey	Standard II	27.08	25.83	M 1-1/16"
o Paulo, Brazil	Type 5	30.84	22.30	SLM 31/32"
rreon-Coahuila, Mexico	M 1-1/16"	⁶ 29.34	25.83	M 1-1/16"
ma, Peru	Tanguis type 5	30.24	⁷ 27.00	SLM 1-3/16"
exandria, UAR	Giza 66 good	30.55	⁸ 26.96	M 1-1/8"
		February 1971		
ombay,India	Digvijay, fine 7/8"	52.18	22.50	SLM 15/16"
arachi, Pakistan	289 F Sind Fine S G	N.A.	23.19	SLM 1"
mir, Turkey	Standard II	28.82	26.27	M 1-1/16"
	Type 5	30.51	22.82	SLM 31/32"
• • •				
no Paulo, Brazil orreon-Coahuila, Mexico	M 1-1/16"	6 28.89	26.27	M 1-1/16"
o Paulo, Brazil	M 1-1/16" Tanguis Type 5	628.89 31.43	26.27 ⁷ 27.67 ⁸ 27.95	M 1-1/16" SLM 1-3/16"

Includes export taxes where applicable. ² Quotations on net weight basis. ³ Averages of prices collected once each week. ⁴ Average spot market gross weight price divided by 0.96 to convert price to a net weight basis. ⁵ Quality of U.S. cotton generally considered to be most nearly comparable to the

foreign cotton. ⁶ Torreon-Coahuila District cotton delivered uncompressed ex-warehouse Brownville, Texas, Mexican export taxes paid. Net weight price-actual price divided by 0.96. $^7\mathrm{Based}$ on El Paso market. $^8\mathrm{Based}$ on average of Fresno, Greenwood, Memphis and El Paso markets. N.A. Not available.

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