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# **Report Name:** Cotton and Products Annual

Country: Pakistan

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# **Report Highlights:**

Pakistan's cotton production for Marketing Year (MY) 2021/22 is forecast at 5.3 million 480 pound (lb) bales, up 18 percent from the revised 2020/21 estimate, due to availability of new seed varieties, better pest and disease management, and government support. Pakistan's cotton output still remains at historic lows, but to keep its textile mills humming it will continue to import large volumes of cotton. MY 2021/22 imports are forecast to remain constant at 5.0 million 480-lb bales. Textile mill consumption is forecast slightly higher at 10.3 million bales, due to brisk milling activity undergirded by strong government support policies for the country's important textile industry.

## **Cotton Overview:**

Cotton is an important cash crop and the lifeline of Pakistan's textile industry. The cotton crop is planted on 14 percent of arable land during the "Kharif" or monsoon season from April to June. Production is concentrated in two provinces with Punjab and Sindh accounting for approximately 65 and 35 percent, respectively, of planting area. Over 90 percent of cotton is produced by small farmers cultivating less than five hectares of land. An estimated 1.5 million farmers grow cotton.

Pakistan's cotton production has been in steep decline since MY 2014/15 when cotton output was at its most recent high of 10.6 million bales (480-lb)<sup>1</sup>. In seven years, Pakistan's cotton production has dropped to an estimated 4.5 million bales (480-lb) in MY 2020/21, a decrease of 61 percent; area planted has dropped from 2.95 MHA to an estimated 2.2 MHA, a decrease of 25 percent for this same period. Reasons for the long-term decline in cotton production are attributable to climate change, the narrow genetic base of cotton germplasm, and inaccessibility to the latest generations of GE cottonseed.

The textile sector is the largest industrial sector in Pakistan and accounts for about 40 percent of the industrial labor force and employs 10 million people. This sector also generates eight percent of Pakistan's Gross Domestic Product and about 60 percent of foreign exchange earnings, the largest of any other product. The integrated cotton and textile sector include 1,050 ginneries, 430 textile mills, and 350 cottonseed crushers and oil refiners.

#### **Production:**

Pakistan's MY (Aug/Jul) 2021/22 cotton production is forecast at 5.3 million 480 lb. bales (6.8 million 170 kg bales or 1.16 million metric tons (MMT)), up 18 percent from the revised 2020/21 estimate, due to the availability of new seed varieties, better on farm pest and disease management, and government subsidization of inputs. Farmers' planting decisions are driven by expected prices in addition to factors such as relative cost of production from competing crops, input availability, and government support. In MY 2021/22, the area devoted to cotton is projected to decrease to 2.1 MHA, five percent lower than the last year, mainly due to a shift to other remunerable crops like corn, rice, and sugarcane. The long-term decline in area planted is mainly due to the potential threat of pest attacks, uncertain weather conditions, and insufficient availability of certified seed.

<sup>&</sup>lt;sup>1</sup> Pakistan's highest cotton production was set in 2004/05 with 11.2 million bales (480-lb).



Cotton planting in Sindh is expected to begin late March while the main producing province of Punjab is anticipated to start in early April 2021. Punjab officials prohibit planting prior to April 1, 2021 to counter the timing of pink bollworm activity in cotton producing areas. There are no reports of locust attacks across Pakistan so far this year. Locusts remain a potential threat and can resurface during summer and may adversely affect cotton production.

Cotton yields are expected to recover from the last year as only core cotton farmers are expected to grow cotton and will be utilizing their experiences to enhance productivity. Borderline farmers will shift to other more profitable crops like sugarcane, rice and corn, because of better prices and government support. Sugarcane farmers receive a support price which guarantees them a fixed price with the mills; rice is Pakistan's major export commodity that fetches a good price in the international and local markets; and corn being a major ingredient for poultry feed, also commands a good price in the domestic market. These alternate crops give good returns to farmers and are also less prone to insect attack and diseases as compared to cotton. In contrast, cotton growers do not receive a support price and prices in the international market, government and industry policy, and the demand for cotton and textile products in the domestic and international market.

Based on sufficient rainfall from December 2020 to January 2021 and heavy winter snowfall, the water availability is expected to remain almost normal for the ensuing summer crops. The MY 2021/22 yield is projected at 549 kg per hectare, 23 percent higher than the current year's estimate of 445 kg per hectare, based on availability of seed from new varieties, better on farm pest and disease management, and government support. There are a number of factors that affect cotton yields in Pakistan, including the following:

- <u>Climate Change</u>: Pakistan is among those countries that are most vulnerable to the effects of climate change. Changing weather conditions, such as unexpected rainfall and temperature changes at critical stages of crop growth can spur pest attack that exact a heavy toll on crop productivity.
- <u>Germplasm</u>: The narrow genetic base of cotton germplasm is prone to insect and diseases and is one of the major factors influencing crop productivity in the country.
- <u>Biotechnology</u>: Pakistan relies on a back-crossed 18-year-old biotechnology event, one that is less effective against bollworms and diseases. This event was obtained illicitly, calling into question Pakistan's ability to safeguard against and enforce intellectual property (IP) infringements. The current reluctance of technology providers to invest in Pakistan is related to these IP concerns and remains an obstacle for the country's cotton farmers in accessing the latest generations of GE cottonseed.
- <u>Pest Infestations</u>: Sucking insects, such as white fly, continue to spread cotton leaf curl virus (CLCV), a disease which drastically reduces yields; and chewing insects, such as pink bollworm, which impairs cotton quality, lowers yield, and requires extra effort on the part of farmers to manage pest levels.
- <u>Locusts</u>: The most recent cyclical emergence of locusts as a threat to all vegetation started in 2019 and continues to be a threat in the cotton producing areas bordering Cholistan in Sindh and Thar in Punjab.
- <u>Cottonseed Quality</u>: This is a perpetual issue with low germination rates and weak certification.
- <u>Government Policy</u>: While a national textile policy has been drafted, this remains stalled and has not yet been approved nor implemented.

Factors that are supportive of higher yields include:

<u>New Cotton Varieties:</u> On January 28, 2021 the Punjab Seed Council (PSC) approved 15 new cotton varieties for cultivation in Pakistan. The major cotton-producing provinces of Punjab and Sindh are expected to benefit from these varieties. Field sources reveal that the supply of certified seed is better than last year. One such new variety was developed as a result of a USDA sponsored program (Cotton Productivity Enhancement Program), which developed the first ever CLCV resistant cotton variety IR-NIBGE-II. This variety was developed through National Institute of Biotechnology and Genetic Engineering (NIBGE) and approved by the PSC and is now available for general cultivation in Pakistan. More

material is in the pipeline with various research institutes to yield results in future.

- <u>Better Pest and Disease Management:</u> Farmers are increasingly aware of the risks associated with the weak expression of the Bt gene in local cotton plants and the need to monitor for bollworms and other diseases. They are also increasingly attuned to the damage of sucking and chewing insects and work to incorporate mitigation measures in the field to manage these pests.
- <u>Subsidies</u>: The government continues to heavily subsidize the supply of inputs like seed, fertilizer, water, pesticides and energy for farmers.

MY 2020/21 production is estimated at 4.5 million 480 lb. bales, 27 percent lower than the previous year's production of 6.2 million 480 lb. bales. This estimation is based on the near-final arrival figure from the Pakistan Cotton Ginners Association and information sourced from other sources. This shortfall in production was generated from 2.2 MHA, a 10 percent decrease in area planted compared to MY 2019/20. During the early stages of crop growth, some cotton acreage was initially damaged by locust attacks. Severe rains during the monsoon season (July-September) also affected the crop in the main growing areas of Punjab and Sindh provinces. Sources indicate that around one million bales of cotton were damaged due to these rains. Heavy rains also resulted in severe pest infestations of whitefly and pink boll worms that went uncontrolled throughout the growing season mainly due to the ineffectiveness of existing pesticides. The MY 2020/21 cotton crop was on target until August 2020, when pressure from pests began take effect, resulting in a lower production estimate of 4.5 million 480-lb bales.

Pakistan mainly produces short and medium staple cotton. Lint quality continues to be an issue within the industry based on the quality of the picking and ginning that result in varying bale sizes and high levels of foreign matter. Additionally, farmers often plant multiple varieties as a hedge against poor germination rates. Hence, identifying specific grades or properties from a particular variety is not done.

#### Status of Bacillus thuringiensis (Bt) Cotton:

Since March 2019, the Pakistan government has put on hold Bt trials on all crops, except for cotton. The National Biosafety Committee has not approved any applications for laboratory, green house or field trials for corn and other food crops submitted by either public research institutes or private companies. Regulatory approval for the cultivation and commercialization of GE cotton, which was granted in 2010, remains unaffected and several GE cottonseed varieties are approved every year. On January 28, 2021, the PSC approved 15 new cotton varieties, out of which 14 containing the Bt trait are now available for cultivation in Pakistan.

Bt cotton is the only crop currently under commercial production in Pakistan. Most of the approved GE cottonseed varieties contain one of the two released events: MON 531 (Cry1Ac gene) or (Cry1Ab gene). Varieties with these events protect cotton from the larvae of lepidopterans (i.e., butterflies, moths) and were introduced for cultivation in Pakistan a few years ago. Pakistan's Center of Excellence in

#### SENSITIVE BUT UNCLASSIFIED

Molecular Biology (CEMB) developed five double gene transgenic cotton varieties that are now being marketed commercially. In 2021, farmers used more than 30 GE cottonseed varieties to plant 2.2 MHA, an acreage that comprises over 95 percent of Pakistan's total cotton planted area.

#### **Consumption:**

MY 2021/22 consumption is forecast at 10.3 million 480 lb. bales (13.2 million 170 kg bales or 2.24 MMT), slightly above last year's consumption level. The marginal increase in cotton consumption is largely due to the shift of textile business to Pakistan due to its relatively effective containment of the pandemic. The comparatively better situation in Pakistan prompted global buyers to partially divert their orders to Pakistani textile manufacturers, due to the worsening of the COVID-19 situation in other countries. Industry sources are hopeful that improved energy supplies will be helpful in managing orders in a timely manner. In addition, the European Union's extension of its "Generalized System of Preferences-Plus" scheme to Pakistan also is expected to act as a stimulus for higher cotton consumption.

Cotton continues to face competition from other man-made fibers and manufacturers in Asia. Still, textiles continue to play an important role in Pakistan's economy. The textile sector is the largest industrial sector in Pakistan and accounts for about 40 percent of the industrial labor force and employs 10 million people. Increased foreign investment in Pakistan's infrastructure and energy sector could help spur additional growth in Pakistan's textile industry.

#### Trade:

Pakistan's textile industry accounts for 60 percent of the country's annual export earnings. The brisk pace of textile production is underway only through government support and very large volumes of imported cotton and man-made fiber (MMF). Major suppliers of imported cotton are the United States, Brazil, Mexico, Argentina, Egypt, and West African countries; suppliers of MMF are China and Europe. Support from the Pakistan government is in the form of tax relief, lower energy prices, and subsidized financing for the expansion of production and establishment of new textile mills.

Pakistan's textile industry contributes significantly to the country's exports and is comprised of both a large-scale organized sector as well as a highly fragmented small-scale sector. The textile value chain consists of spinning, weaving, processing, printing, and garment manufacturing (e.g., knitwear, clothing and readymade garments) sectors. Pakistan exports raw material, semi-finished and finished cotton and textile products to a number of countries, including the United States, the United Kingdom, Hong Kong, Japan, Korea, Saudi Arabia, the European Union, Canada, and Australia.

Pakistan is a net importer of cotton, primarily due to strong demand for better grades of cotton for blending and producing export-oriented quality textile products. Typical imports include upland and long staple cotton, as well as medium staple cotton, to augment domestic supplies for processing and re-export. During MY 2020/21, significant shortfalls in domestic production necessitated substantial

increases in the importation of short and medium staple cotton. While cotton output for MY 2021/22 is forecast up 18 percent, production levels remain at historic lows and Pakistan's imports for MY 2021/22 are projected to remain at 5.0 million bales (480 lb). MY 2019/20 imports have been revised to 4.0 million bales to reflect official data.

Despite sizeable imports, Pakistan continues to export small volumes of cotton during harvest. MY 2021/22 exports are forecast at 50,000 480 lb. bales, with the main destination countries being Vietnam, Indonesia, Bangladesh, Thailand, and China.

		(Quali	ity in Meure	10115)			
MONTH/YEAR	IMPORTS			EXPORTS			
	MY 2018/19	MY 2019/20	MY 2020/21	MY 2018/19	MY 2019/20	MY 2020/21	
August	7,126	3,358	41,974	1,493	2,677	206	
September	6,247	2,142	56,561	2,029	1,643	34	
October	8,220	5,548	51,856	2,988	974	206	
November	9,896	8,990	50,791	919	1,544	0	
December	12,272	14,620	92,452	163	806	53	
January	9,399	67,698	107,537	230	420	0	
SUB TOTAL	53,160	102,356	401,171	7,822	8,064	499	
February	73,212	117,787		527	701		
March	68 <i>,</i> 556	101,600		307	155		
April	85,083	71,062		1,701	0		
May	60,345	62,235		207	0		
June	44,580	64,692		906	0		
July	14,562	32,825		2,660	0		
TOTAL	399,498	552,557	401,171	14,130	8,920	499	

#### Cotton Trade Statistics: MY 2018/19 to 2020/21 (Quantity in Matria Tons)

Source: Pakistan Bureau of Statistics (PBS), Government of Pakistan

#### **Policy:**

Pakistan maintains minimal tariff restrictions on cotton imports, in the form of a 3 percent regulatory duty. However, there is a tendency to impose additional tariffs during harvest period to limit the flow of cotton in order to maintain domestic prices. Normally, from July to December, the government imposes an additional customs duty (usually 1 to 2 percent) and a 5 percent sales tax on imported cotton and exempts domestic cotton from the sales tax. However, for the past two years, the tariff and sales tax for imported cotton have dropped to zero starting in January, remaining in effect until July in order to facilitate supplies to the textile sector.

Although imports of cotton from India have dropped almost to zero due to 2019 border tensions that resulted in Pakistan turning to other international cotton suppliers, low cotton output was of sufficient concern that Pakistan had seriously been considering the importation of Indian cotton and yarn in March 2021. However, this effort ultimately failed due to lack of government consensus, leaving the border still closed to imports of Indian cotton and yarn.

## Pakistan's Textile Policy 2020-25 -- Approval in the Doldrums

For the last year, the Pakistan government has been in the process of approving a new five-year textile policy, known as Textile Policy 2020/25. The aim of this policy is to achieve product maximization and job creation, as well as to fuel growth in exports to \$25.3 billion by 2025. Sources indicate that the government appears to have considered every angle in reviving its textile industry. Key features of the new policy include no or low interest loans that will be available through new funding mechanisms, such as a Brand Development Fund (BDF) to help boost the export of textile products; a Long-Term Financing Facility (LTFF) to fund the purchase of textile and apparel machinery; and an Export Financing Scheme (EFS) to fund the production of textiles and garments for export.

This new textile policy is an example of the type of developmental model wherein the government incentivizes a select industry so that it can be – or remain, in the case of Pakistan's textile industry -- a significant contributor to the overall economic stability of the country. The government's Textile Policy 2020-25 has received the approval of Pakistan's national textile industry association, which is hopeful that the incentives will prove instrumental in achieving the export target identified and attracting long-term investment in Pakistan's textile value chain.

Cotton	2019/2020		2020/2021		2021/2022	
Market Year Begins	Aug 2019		Aug 2020		Aug 2021	
Pakistan	USDA Official	New Post	USDA Official	New Post	USDA Official	New Post
Area Planted (1000 HA)	0	0	0	0	0	0
Area Harvested (1000 HA)	2450	2450	2200	2200	0	2100
Beginning Stocks 1000 480 lb. Bales	2495	2495	3390	3390	0	2615
Production 1000 480 lb. Bales	6200	6200	4500	4500	0	5300
Imports 1000 480 lb. Bales	3975	3975	5000	5000	0	5000
MY Imports from U.S. 1000 480 lb. Bales	0	0	0	0	0	0
Total Supply 1000 480 lb. Bales	12670	12670	12890	12890	0	12915
Exports 1000 480 lb. Bales	55	55	50	50	0	50
Use 1000 480 lb. Bales	9200	9200	10200	10200	0	10300

#### **Production, Supply and Demand Data Statistics:**

Loss 1000 480 lb. Bales	25	25	25	25	0	25	
Total Dom. Cons. 1000 480 lb. Bales	9225	9225	10225	10225	0	10325	
Ending Stocks 1000 480 lb. Bales	3390	3390	2615	2615	0	2540	
Total Distribution 1000 480 lb. Bales	12670	12670	12890	12890	0	12915	
Stock to Use % (PERCENT)	36.63	36.63	25.51	25.51	0	24.54	
Yield (KG/HA)	551	551	445	445	0	549	
(1000 HA) ,1000 480 lb. Bales, (PERCENT), (KG/HA)							

### Attachments:

No Attachments