Influence of India’s Export Restrictions on the World Cotton Market
National Cotton Council
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Summary

India, the world’s second largest producer and processor of raw fiber, is a wildcard in the current cotton market. Over the past decade, increased production has allowed India to emerge as the 2nd largest exporter of cotton. However, since April, India’s use of various restrictions on cotton exports has greatly added to the volatility and uncertainty in the world cotton market.

Following the April 19 announcement of an export ban, the difference between the world price and India’s Shankar-6 internal price grew to 13 cents. Prior to the announcement, the differential between the two prices averaged 5 cents. By introducing an artificial gap between world and internal prices, India’s uncertain export regime conveys benefits to their textile industry at the expense of textile industries in other countries.

An analysis of India’s cotton situation indicates that absent any export restrictions, India’s cotton exports could have reached 7.76 million bales in ‘09/10, an increase of 1.21 million bales from actual levels. For ‘10/11, India’s exports under a scenario of no export restrictions are estimated at 5.46 million bales, or 660 thousand bales above USDA’s current estimate. Based on market share data for key importing countries, each 1-bale increase in imports of Indian cotton translates into a 0.85-bale decrease in imports of US cotton. In ‘09/10, applying the 0.85 coefficient gives a US export decline of 1.03 million bales. Consequently, US ending stocks would be 1.03 million bales above actual levels for the ‘09/10 marketing year. For the ‘10/11 marketing year, India’s increased exports under the scenario translate into 560 thousand bale reduction in US exports relative to the October World Agricultural Supply & Demand Estimates (WASDE). Combined with increased beginning stocks, total ‘10/11 supplies available to the US textile industry would be 1.59 million bales higher than projected levels that incorporate existing export restrictions.

Overview of the World Cotton Market

In November ‘08, the December cotton futures contract closed under 40 cents/lb. Though not an all-time low, it did mark one of the few times that the nearby December contract closed below 40 cents as cotton demand was faltering due the turmoil in the world economy. By late October ‘10, cotton prices had reached historically high levels – at least the highest levels in the past 140 years. With December ’10 futures trading above $1.20 and Cotlook’s “A” Index topping $1.40 per pound, cotton prices have tripled in the last 2 years (Figure 1).
The ‘09/10 marketing year presented a much different landscape than the previous five years as global mill use exceeded production by a substantial margin (Figure 2). Cotton demand recovered from the recession-reduced levels of ‘08/09 with total mill use (adjusted for the unaccounted term) surpassing 115 million bales. The rebound in demand occurred at the same time that world production fell to its lowest level since the ‘03/04 marketing year.

Although average yields were slightly below trend, production potential for the ‘09/10 marketing year was limited by continued decline in cotton area. Globally, world area fell to the lowest level since the ‘86/87 marketing year as grain and oilseeds continued to attract area. The resulting supply-demand differential reduced stocks by 14 million bales.

For the ‘10/11 marketing year, cotton production is projected to be up sharply but still falls short of expected demand. As a result, a further decline in stocks is projected for ‘10/11.
Globally, USDA puts ‘09/10 ending stocks at 46.7 million bales, down from 60.4 million bales the previous year. To appreciate the current stocks situation, remember that ending stocks represent a snapshot as of July 31, the official end of the marketing year. However, much of the new crop in the Northern Hemisphere will not enter the marketing channels until mid-October or early November. At a minimum, a domestic mill’s cotton needs between July 31 and mid-October, or three and one-half months, must be satisfied with cotton stocks from the previous year. Based on current consumption rates, textile mills will spin slightly more than 35 million bales between July 31 and mid-October. Subtracting the textile mill’s needs from July 31 ending stocks leaves a difference of just over 11 million bales. In previous years, a comparable calculation would generate between 26 and 28 million bales – an amount more than double this year’s figure.

In the United States, ‘09/10 ending stocks fell below 3 million bales, reaching their lowest level since ‘95/96. In the October WASDE, USDA projects ‘10/11 stocks to fall to just 2.7 million bales, resulting in a stocks-to-use relationship of 14.1%.

In recent years, New York futures and projected stocks/use ratios have exhibited the expected inverse relationship (Figure 3). For the current marketing year, prices have moved sharply higher as the projected balance sheet has tightened. However, even with the tighter stocks situation in the United States, it seems clear that other factors have also fueled the current rally.
China remains a dominant force in the world cotton market. In ‘09/10, China’s mill use was estimated at 49 million bales, up substantially from the recession-reduced level of 44 million bales in ‘08/09. While mill use was recovering, China’s domestic production slipped to 32 million bales. In addition to importing almost 11 million bales in the ‘09/10 marketing year, the Chinese government aggressively auctioned cotton from state reserves in an effort to satisfy the internal deficit. Since May ’09, China has auctioned more than 16 million bales from state reserves. At this point, the big unknown is how much is left in the reserves and at what point will China choose to rebuild reserves.

Given the current stocks situation and limited exports by the world’s 2nd largest producer, the cotton market is extremely sensitive to any potential production problems with the ‘10/11 crop. Pakistan ranks 3rd in total mill use and 4th among all countries in terms of production. The country is also a net importer of cotton as domestic production fails to meet the needs of the textile industry. In late summer, devastating floods affected portions of the cotton-producing regions in Pakistan, and initial estimates indicate that production losses could exceed 1 million bales. As a result, imports for the ‘10/11 marketing year are expected to increase from previously expected levels.

Uncertainty also exists regarding China’s production. In the October WASDE, USDA lowered the ‘10/11 crop from 32.5 million bales down to 31.5 million. However, due to recent weather problems, internal estimates from China suggest an even smaller crop – perhaps as low as 29.5 million bales. If a crop below 30 million bales comes to fruition, China will very likely be a larger cotton importer than currently called for by USDA.

Looking ahead to the ‘11 planting season, there will be tremendous focus on potential acreage shifts, not only in the United States but also in other countries. Historically, US cotton acres have tracked very closely with expected market prices, as measured by harvest-time futures contracts during the weeks leading up to planting. In ‘10, the ratios moved in cotton’s favor as cotton prices increased. As of mid-October, cotton prices for the December ’11 contract are trading
substantially higher than the previous year. However, the same can also be said for corn and soybeans. In fact, the price ratios for the ’11 contracts put cotton at a slight disadvantage relative to those same ratios for the ’10 planting season.

Impact of India’s Export Restrictions

India, the world’s 2nd largest producer and processor of raw fiber, is truly a wildcard in the current cotton market. Over the past decade, increased production has allowed India to become the 2nd largest exporter of cotton (Figure 4). However, at a time of recovering world demand, recent policy decisions by India have added to the volatility and uncertainty in the world cotton market.

Since April, India has employed some type of restriction on cotton exports. This comes on the heels of repeated assurances by government officials that there were no plans to curb exports. The following timeline highlights India’s recent policy announcements.

- November ‘09 – Textile Ministry seeks ban on cotton exports in response to request from Federation of Indian Export Organizations.
- December ’09 through March ‘10 – Numerous reports indicate that government officials have no plan to limit or ban cotton exports in ‘09/10.
- April 9 – Textile Commissioner proposes export duty on raw cotton; Finance Minister approves and refers to Commerce Minister. Customs officials at ports quit clearing shipments pending official notification of procedures. This is de facto ban on exports.
- April 13 – India announces an export tax of approximately 2.5 cents/lb.
- April 19 – At the urging of their textile industry, India announces that all registrations of cotton exports will be suspended until further orders. Shipments of previously registered export contracts are stopped with an immediate effect. (NY futures promptly jumped the 3-cent exchange limit. Cotton prices in Gujarat, one of the largest cotton manufacturing states, dropped by 5 cents.)
- May 21 – India relaxes the export ban by announcing a new export licensing arrangement that allows exports to be limited and closely monitored by the government. In addition, India continues an export tax of approximately 2.5 cents/lb announced April 13.
- June 4 – First licenses are issued only for Bangladesh and Pakistan shipments that had been registered under previous export scheme. No new sales are permitted.
- June 17 – Government issues some licenses for other destinations, but uses bureaucratic delays to minimize volumes and delay shipments.
- June 18 – India announces that cotton export restrictions will be removed on October 1.
- Mid-August – Press reports indicate that exports are set to resume on October 1 but still must be registered with the Textile Commissioner.
- September 28 – Government announces an export quota of 4.3 million (480 lb) bales for the ‘10/11 marketing year. Export registrations can begin October 1 with shipments beginning November 1 and no later than December 15. All applications must be supported with signed contracts and workable L/C’s, or bank notice of prepayment, or CAD contract. Incomplete applications will be rejected. No extensions for shipment will be allowed.
- October 1 – On-line export registration begins, and within 1 week, 2.7 million bales are registered.
- October 10 – India halts registration process after applications have been submitted for the full quota. Exports must be shipped within 45 days of registration (which implies that exports must be shipped by mid-to-late December. Applicants are allowed 7 days to submit valid contracts and other documents (contrary to announced policy).
- October 11 – Indian traders with export registrations began shopping for buyers.
- Late October – India’s textile industry continues to call for delaying cotton exports until January ‘11 and/or limiting monthly shipments to 1 million 170kg bales per month. Press reports indicate that government officials are also considering restrictions on cotton yarn exports.

When an exporting country institutes border restrictions, the expected impact is for world prices to be pushed higher while internal prices are pressured lower. Based on reported price data, India’s export ban had that exact impact. During the two weeks following the April 19 announcement, the difference between the world price, as measured by the “A” Index, and India’s Shankar-6 internal price grew to 8 and 13 cents, respectively (Figure 5). In the months leading up to the announcement, the differential between the two prices averaged 5 cents. The differential continued to range between 9 and 13 cents through mid-June. At that point, India announced that the export ban would be lifted on October 1 and relative prices immediately reflected the anticipated removal of the export ban.

In October, India’s price again moves to a substantial discount relative to the “A” Index as the export registration process is halted and harvest approaches. The most recent data indicate that India’s internal prices are 16 cents below the “A” Index.
India’s uncertain export regime has sharply reduced their presence in the world market and contributed to the rise in world cotton prices. Importers are forced to be more aggressive in securing their anticipated cotton needs due to the expected absence of the world’s 2nd largest cotton exporter. As a result, importing countries have looked to other suppliers for their cotton needs. As evidenced by import data for China, the overwhelming majority of reduced sales by India have resulted in additional exports by the United States (Figure 6). A similar situation prevails in other importing countries.

![Figure 5. Cotton Prices](image)

![Figure 6. Market Share of China's Cotton Imports](image)
Clearly, India’s export restrictions have resulted in additional exports of US cotton and a tighter balance sheet. To quantify the impact of the restrictions, a scenario with no export restrictions is analyzed (Figure 7). USDA’s October WASDE estimates are used as the baseline, or actual’s, against which the scenario is measured. In the ‘09/10 marketing year, India exported 6.55 million bales of cotton with the export restrictions in place. Ending stocks for ‘09/10 totaled 6.67 million bales, giving a stocks-to-mill use ratio of 34%.

A key question is the extent to which India’s cotton exports would have exceeded their actual levels had the restrictions not been in place. One approach to determine the potential exports is to focus on the resulting stocks-to-mill use ratio relative to past years. While the ‘09/10 ratio of 34% is relatively tight by historical standards, tighter relationships have prevailed in recent years. For example, India’s stocks-to-mill use ratio was 28% in ‘00/01, 27% in’02/03, and 30% in ‘07/08.

Based on these historical observations, the scenario assumes that India’s exports increase by an amount necessary to reduce ending stocks to 28% of mill use. Under the scenario, ‘09/10 exports are estimated to increase to 7.76 million bales and ending stocks would be 5.46 million bales. The resulting exports would be 1.21 million bales above ‘09/10 actual exports.

For the ‘10/11 marketing year, India’s exports are again assumed to reach a level that results in a stocks-to-mill use ratio of 28%. India’s exports reach 5.46 million bales, up 0.66 million bales from USDA’s October estimate of 4.80 million bales. In the scenario, ending stocks for ‘10/11 would be 5.80 million bales.

Based on recent historical data for market shares of key importing countries, each 1-bale increase in imports of Indian cotton translates into a 0.85-bale decrease in imports of US cotton. Assuming total world trade stays unchanged, the remaining 0.15 bales come from other cotton exporters. In ‘09/10, applying the 0.85 coefficient gives a US export decline of 1.03 million bales. Consequently, US ending stocks would be 1.03 million bales above actual levels for the ‘09/10 marketing year. For the ‘10/11 marketing year, India’s increased exports under the scenario translate into 560 thousand bale reduction in US exports relative to the October WASDE. Combined with increased beginning stocks, total ‘10/11 supplies available to the US textile industry would be 1.59 million bales higher than projected levels that incorporate existing export restrictions. (In the scenario, no changes in production or mill use are assumed.)

Figure 7. Analysis of India ‘No Export Restrictions’ Scenario

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While continuing to push for a complete ban on exports, growth in India’s textile industry is bolstered by the presence of a number of government subsidies. In September, the Indian government released more than $130 million under the Technology Upgradation Fund Scheme (TUFS). The program provides interest reimbursements and capital subsidies for investments in the textiles and clothing sectors. This follows on the heels of an August announcement regarding subsidized interest rates for textile exporters. All contribute to India’s growing demand for cotton fiber – growth which is coming at the expense of textile industries in other countries. Growth in India’s textile industry allows them to maintain their position as an exporter of cotton textiles and apparel (Figure 8).