



COTTON:Review of the World Situation

International
Cotton
Advisory
Committee

Volume 64 - Number 3 January-February 2011

Table of Contents

SUMMARY OF THE OUTLOOK FOR COTTON	Availability of Production at the Point of Consumption12
PASS-THROUGH ANALYSIS OF COTTON	China's Special Circumstances12
PRICES	Determining a Seasonal Low Point for
Introduction 4	World Stocks13
Data 4	Projecting a Minimum Stocks
Theoretical Pass-Through 5	Level for July 31, 201113
Descriptive Statistics 6	Topics for Further Study and Analysis13
Conclusions 9	THE STRUCTURE OF WORLD COTTON TRADE 18
COMMENT - TWO-TIER PRICING?10	Largest19
ESTIMATING MINIMUM GLOBAL COTTON	Large19
STOCKS FOR 2010/11 BASED ON	Medium20
PRODUCTION AVAILABILITY11	Specialized20
Methods11	Banks and Ocean Freight Organizations20
Would do	Insurance Companies20
Tables	
Supply and Distribution of Cotton 2006-2011	2



SUPPLY AND DISTRIBUTION OF COTTON February 1, 2011

Seasons begin on August 1

Seasons begin on August 1	2006/07	2007/08	2008/09	2009/10	2010/11	2011/12
			Million Metric	Est.	Proj.	Proj.
BEGINNING STOCKS			Willion Wetric	TOTIS		
WORLD TOTAL	12.550	12.782	12.225	11.942	8.87	9.21
CHINA	3.991	3.653	3.321	3.585	2.94	2.71
USA	1.321	2.064	2.188	1.380	0.64	0.44
PRODUCTION						
WORLD TOTAL	26.747	26.020	23.324	21.778	25.05	27.40
CHINA	7.975	8.071	8.025	6.850	6.40	7.21
INDIA	4.760	5.219	4.930	5.050	5.72	6.01
USA	4.700	4.182	2.790	2.654	3.99	4.05
PAKISTAN	2.121	1.876	1.891	2.019	1.83	2.18
BRAZIL	1.524	1.602	1.214	1.194	1.84	1.95
UZBEKISTAN	1.171	1.206	1.000	0.850	1.00	1.10
OTHERS	4.496	3.864	3.474	3.161	4.28	4.90
CONSUMPTION						
WORLD TOTAL	26.418	26.498	23.518	24.614	24.70	25.38
CHINA	10.600	10.900	9.265	9.867	9.82	10.11
INDIA	3.908	4.050	3.863	4.222	4.56	4.88
PAKISTAN	2.633	2.649	2.428	2.307	2.20	2.27
EAST ASIA & AUSTRALIA	1.864	1.835	1.680	1.829	1.78	1.79
EUROPE & TURKEY	2.084	1.744	1.409	1.550	1.48	1.49
BRAZIL	0.987	1.001	0.994	1.002	1.04	1.06
USA	1.074	0.998	0.781	0.754	0.78	0.74
CIS	0.681	0.664	0.596	0.607	0.59	0.58
OTHERS	2.587	2.657	2.502	2.476	2.45	2.46
EXPORTS						
WORLD TOTAL	8.068	8.375	6.616	7.767	8.25	8.43
USA	2.821	2.968	2.887	2.621	3.41	3.09
INDIA	0.960	1.530	0.515	1.420	1.01	1.00
UZBEKISTAN	0.980	0.900	0.630	0.790	0.83	0.76
CFA ZONE	0.924	0.595	0.464	0.553	0.58	0.58
AUSTRALIA	0.465	0.265	0.261	0.460	0.57	0.77
BRAZIL	0.283	0.486	0.596	0.433	0.53	0.75
IMPORTS						
WORLD TOTAL	8.147	8.396	6.526	7.712	8.25	8.43
CHINA	2.306	2.511	1.523	2.374	3.20	3.64
EAST ASIA & AUSTRALIA	1.899	1.860	1.665	1.888	1.81	1.84
EUROPE & TURKEY	1.340	1.081	0.861	1.174	0.91	0.95
PAKISTAN	0.502	0.851	0.417	0.336	0.37	0.17
CIS	0.322	0.271	0.239	0.219	0.17	0.16
TRADE IMBALANCE 1/	0.078	0.021	-0.090	-0.055	0.00	0.00
STOCKS ADJUSTMENT 2/	-0.176	-0.100	0.002	-0.184	-0.01	0.00
ENDING STOCKS						
WORLD TOTAL	12.782	12.225	11.942	8.867	9.21	11.22
CHINA	3.653	3.321	3.585	2.937	2.71	3.45
USA	2.064	2.188	1.380	0.642	0.44	0.67
ENDING STOCKS/MILL USE (%)						
WORLD-LESS-CHINA 3/	58	57	59	40	44	51
CHINA 4/	34	30	39	30	28	34
COTLOOK A INDEX 5/	59.15	72.90	61.20	77.54	156*	34

^{1/} The inclusion of linters and waste, changes in weight during transit, differences in reporting periods and measurement error account for differences between world imports and exports.

The projection based on the average price for the first six months of 2010/11 and our judgement thet during the rest of 2010/11 prices would remain close to the average recorded during the most recent month (January 2011).

^{2/} Difference between calculated stocks and actual; amounts for forward seasons are anticipated.

^{3/} World-less-China's ending stocks divided by World-less-China's mill use, multiplied by 100.

^{4/} China's ending stocks divided by China's mill use, multiplied by 100.

^{5/} U.S. cents per pound.

^{*} The price projection for 2010/11 is not based on the ICAC price model.

SUMMARY OF THE OUTLOOK FOR COTTON

Prices Continue Rising to Record Levels

World cotton prices continued rising during the first month of 2011, reaching records and nearing the two-dollar-perpound territory. Between December 31, 2010 and January 28, 2011 the Cotlook A Index rose by 25.5 cents per pound (up 15%) and reached 197.5 cents per pound. During the first half of 2010/11, the Cotlook A Index gained almost 130%, adding 111 cents per pound. The season average Cotlook A Index reached close to 140 cents per pound, 80% higher than the 2009/10 average of 77.5 cents per pound. The New York futures contract for March 2011 delivery rose from 77 cents per pound on August 2, 2010 to a record of 169 cents per pound on January 27, 2011. During the same period, the futures contract for October 2011 delivery (2011/12 crop) rose from 75 cents per pound to 127 cents per pound, indicating the possibility of lower prices in 2011/12.

Very low world stocks of cotton; limited supply, robust demand and a depreciation of U.S dollar may have caused the surge in prices during 2010/11. 2010/11 started with a very low level of world cotton stocks estimated at 8.9 million tons, the lowest since 1993/94. The world ending stocks-to-use ratio in 2010/11 is estimated at 37%, the only seasons with lower levels were in 2009/10 and 1990/91 when a ratio of 0.36 was recorded. By the end of 2011/12, stocks are expected to increase to 11.2 million tons equaling 44% of expected use.

World cotton production is projected to rise by 15% during 2010/11 to 25 million tons, and will be almost equal to projected mill use. World cotton mill use started to recover in 2009/10 due to the improved global economic environment, and a robust demand from spinning mills was observed during the first half of 2010/11. However, very high cotton prices and

shortages of supply are expected to limit mill use expansion during 2010/11 close to 25 million tons, almost unchanged from 2009/10. No growth in mill use is projected for major consuming countries, except for India, where mill use may grow by 8% to 4.6 million tons.

Purchases of cotton by importers are unusually advanced during 2010/11, and the scarce uncommitted supply may provide strong pressure on prices and cause increased volatility through the rest of the season. As of January 20, 2011, USA export commitments reached 3.4 million tons, or 97% of projected exports for the season. At this time in 2009/10, U.S. export commitments were at 65% of exports. The USA is the largest exporter of cotton, accounting for an estimated 41% of world exports in 2010/11. All other major exporters have committed most of their crops as well, including major exporters in the Southern Hemisphere, such as Brazil and Australia, where crop potentials were reduced by unfavorable weather. Southern Hemisphere cotton will not become physically available until April 2011. In 2010/11, exports by India, the world's second largest exporter, were capped by the government below 1 million tons, all of which have been committed.

The Secretariat acknowledges that in the current environment of volatility, the ICAC price model may be less relevant than in other seasons. The Secretariat season-average projection for the 2010/11 Cotlook A Index is 156 cents per pound. The projection is not based on the ICAC price model, but on the average price for the first six months of the season and our judgment that during the rest of the season prices would remain close to the average recorded during the most recent month (January 2011).

COTTON COTTON

PASS-THROUGH ANALYSIS OF COTTON PRICES¹

By Jon Devine² and Alejandro Plastina^{3, 4}

Introduction

A common question when analyzing supply chains is how much a change in input costs at a given link in the supply chain affects prices downstream. To address this question, research has been conducted that examines the extent that changes in prices are "passed-through." However, there is no known research analyzing the effect of changes in cotton fiber prices on prices for cotton textile goods. Given the dramatic increases in cotton prices in the fourth quarter of 2010, the objective of this research is to investigate relationships between changes in cotton fiber prices and changes in prices for cotton textile goods throughout the supply chain.

Due to the multiple processes involved in the manufacture of cotton textiles (i.e., spinning, fabric manufacturing, and apparel construction), there is potential for constructing a pass-through analysis for cotton prices at different stages in the textile manufacturing process. For the purposes of this analysis, the cotton supply chain is defined in stages including fiber, yarn, fabric, garment assembly, and retail. Price data for a range of cotton fiber qualities from a range of cotton producing countries are readily available, as are price data for many qualities and sources of cotton varn. More challenging, in terms of data availability, are prices further downstream in the supply chain. There is a wide range of fabrics used in a wide range of apparel items, and this variability, along with the fact that fabric prices are negotiated privately, introduces difficulty to collect representative price data for fabric. Nonetheless, cotton textile supply chains are highly globalized, and trade data can be used to derive prices for fabric. Similarly, trade data can be used to collect prices following the cut and sew stage of the manufacturing process required to assemble garments. Consumer price indexes are used to measure retail apparel prices.

In addition to measuring the extent to which the magnitude of price increases are passed through supply chains, pass-through analysis also allows researchers to investigate how long it takes changes in prices at one stage in the supply chain to result in changes in prices further downstream. This research examines both the magnitude and temporal nature of price relationships. Evidence was found that the increases in cotton fiber prices are completely passed-through the fiber-to-yarn link in the supply chain, and changes in cotton fiber

prices are passed through almost immediately to yarn prices. At the yarn-to-fabric link, some evidence was found that the recent increases in yarn prices have led to higher fabric prices. However, given that the sharpest increases in cotton prices occurred in the fourth quarter of 2010 and that this publication is being released in February 2011, evidence has yet to surface regarding relationships between fabric prices, prices for assembled garments, or retail prices for cotton apparel.

Considering the fact that cotton fiber prices more than doubled between August and December 2010, it could be expected that costs following garment assembly and retail prices will eventually be affected. Since it takes several months between the time that retailer orders are placed and the time that those goods arrive in ports or on retail shelves, changes in prices at these late stages in the supply chain may not become detectable in retail price data until several months after this paper is published. As a result, current and future research is focused on continued monitoring of prices.

Data

For this general examination of the cotton supply chain, an effort was made to use the most aggregated data available in order to best represent the effects of changes in world cotton prices on the highly globalized cotton supply chain. At the first link in the supply chain, the fiber-to-yarn stage, figures generally recognized as being reflective of world prices are readily available. For fabric and garment stages in the supply chain, trade data were used. At the garment and retail stage, U.S. data were used. As a result, this analysis represents an investigation of price movement in the highly globalized cotton textile supply chain as it impacts the U.S. consumer.

The Cotlook A Index is used as the reference price for cotton fiber in this study. The A Index is a cost and freight (CFR) price for of 1-3/32 inch staple Middling cotton delivered to ports in the Far East, where the majority of the world's cotton is spun into yarn. The Cotlook A Index is published by Cotlook Ltd.

The Cotlook Yarn Index is used as the reference price for cotton yarn. The yarn index is a trade weighted average of 20s and 30s Ne carded ring spun weaving yarn of what Cotlook considers "average" quality. Free-on-board (FOB) prices for these yarns are collected from China, India, Pakistan, Indonesia, and Turkey. Collectively, these countries represent

¹⁾ Paper presented at the 2011 Cotton Beltwide Meetings in Atlanta, GA, USA. January 6-7.

²⁾ Manager, Supply Chain Economics, Global Product Supply Chain, Cotton Incorporated, Cary, NC, USA, phone: +1 (919) 678-2320, e-mail: jdevine@cottoninc.com.

³⁾ Economist, International Cotton Advisory Committee, Washington, DC, USA, phone: +1 (202) 463-6660, e-mail: alejandro@icac.org.

⁴⁾ Authors listed in alphabetical order.

nearly 75% of the world's consumption of raw cotton fiber into yarn (ICAC). Weightings are based on average export volumes for the two most recent calendar years.

Being a more differentiated product than fiber or yarn, fabric price data were derived from trade data. Given that volume and value data are collected when goods traverse international borders, trade data are a potential solution to the problem of data availability at the fabric stage of the cotton supply chain. Import, rather than export, figures were used since tariffs are collected on imports, and import figures are commonly accepted as slightly more reliable than export figures.

Data were gathered from Global Trade Information Services' Global Trade Atlas. The fabric prices that were used in the analysis were those for cotton woven fabric (Harmonized Schedule codes 5208 and 5209) imports into China, the world's largest importer of these fabrics. Woven, rather than knit, fabric prices were used because Cotlook's yarn index reflects prices for weaving yarns. Traded values, expressed in dollars, were divided by volumes in terms of square meters of fabric in order to give prices in dollars per square meter of fabric.

Fabric is cut and sown to make garments. With the world apparel trade being highly globalized, landed import values can be used to describe prices at this stage of the supply chain. The U.S. Department of Commerce's Office of Textiles and Apparel (OTEXA) publishes value and volume data for each apparel category represented by the U.S. Harmonized Tariff Schedule. In addition to publishing data for individual categories, OTEXA also publishes figures for aggregations of apparel categories. One of these aggregated categories represents cotton dominant apparel imports, describing both the volume, in terms of square meter equivalence, and value of apparel imports made from fabric containing more than fiftyone percent cotton fiber content. Using the figures for volume and value, a cost per square meter equivalent can be derived. These values are used to describe prices at the garment stage of the supply chain.

Since garment prices are those for the U.S., monthly U.S. apparel consumer price index (CPI) data are used to describe prices at retail. Cotton textile products represent between

60% and 70% of all textile items sold at retail level in the United States. With cotton products representing the majority of apparel products, the apparel CPI, which covers apparel goods of all items, is thought to be representative of the effect of changes in cotton fiber prices on U.S. retail apparel prices.

All data used are monthly averages or totals. The time period for the analysis is from August 2004, the onset of the 2004/05 crop year, to December 2010. Analysis began with the 2004/05 season because this was the first complete crop year where A Index values represented delivery quotes to the Far East. Prices are expressed in U.S. dollars.

Theoretical Pass-Through

One way to begin a discussion of the pass-through of cotton prices is to look at how much cotton is required to manufacture various types of cotton apparel goods. With such an amount expressed in terms of weight, any changes in cotton prices expressed in terms of cents/lb can be multiplied by this weight in order to derive a theoretical increase in the cost of fabricating apparel goods if the change in cost was solely a function of the change in cotton prices.

To track cotton consumption in the U.S., Cotton Incorporated has collected data regarding the average weight of apparel sold at retail. Given that some cotton fiber can be assumed to be lost in the manufacturing process, a compensation for this waste should be added to retail weights to come up with a representation of the total amount of cotton required to manufacture certain cotton products. Examples of waste include the small percentage of a bale that is field trash and the amount of fabric lost in the cut and sew process to assemble garments. In order to estimate the amount of cotton lost in manufacturing for different items of apparel, the USDA has come up with a set of waste factors. In addition to waste, these conversion factors also account for blending with other fibers and non-fiber content (e.g., leather). When paired with retail product weights collected by Cotton Incorporated, these conversion factors can be used to estimate the total amount of cotton fiber used to manufacture different apparel items. The total amount of cotton estimated to be required to manufacture several of the most commonly purchased cotton apparel products appears in Table 1.

Table 1. Estimated Impact on Cost of Cotton Apparel Goods with a 80 cents/lb Increase in Cotton
Prices for Select Apparel Items

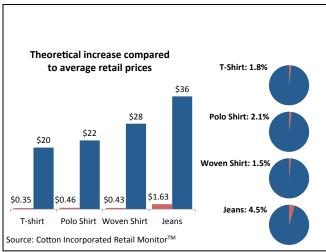
Common Cotton Apparel Products	Total Cotton Estimated for the Manufacture of Apparel Goods (lbs)	Theoretical Effect of 80 cents/lb Increase in Fiber Prices
T-Shirt	0.41	+\$0.33
Polo Shirt	0.54	+\$0.43
Woven Shirt	0.50	+\$0.40
Jeans	1.92	+\$1.54

Sources: Cotlook, Cotton Incorporated, USDA

To these estimates for the total amount of cotton fiber in apparel goods, we can multiply changes in cotton prices. Retailer orders for garments are commonly discussed in terms of quarters. As a result, it could be appropriate to frame this discussion of theoretical increases in prices in terms of year-over-year differences by quarters. Cotton prices in the fourth quarter of 2010 (150 cents/lb) were about 80 cents/lb higher than they were during the same time period in 2009 (72 cents/lb). This price difference is multiplied by the total amount of cotton estimated for the manufacture of cotton apparel goods in order to derive a theoretical increase in the cost of fabricating apparel goods if the change in costs was due only to the change in cotton prices. These theoretical increases appear in Table 1.

To put the magnitude of these theoretical increases into context, it may be helpful to look at them in relation to average retail prices. Through Cotton Incorporated's Retail MonitorTM, retail prices in the United States are tracked for a range of apparel products. Using these data, the theoretical increases resulting from the 80 cents/lb increase in cotton prices can be compared to average retail prices. Results suggest that the theoretical impact of an increase in cotton prices should be less than five percent for the items examined, and that lighter weight apparel items (e.g., t-shirts) would be affected less than heavier apparel items that contain more cotton fiber (e.g., jeans).

Figure 1. Theoretical Impact on Apparel Costs Relative to Average Retail Prices



Further context can be provided by examining these hypothetical increases in relation to the percentage of consumers' overall budgets. The Department of Commerce estimates that consumers spend about three percent of their disposable income on garments. Assuming a three percent increase in the price of apparel resulting from the recent increases in cotton prices, simple multiplication would imply an effect on consumers' budgets of about one tenth of one percent. With this hypothetical effect being so small, and

with prices for other commodities including those related to food and energy also rising, the impact of cotton prices on consumer budgets and levels of consumer apparel purchases may be less than the impact of rising oil and food prices.

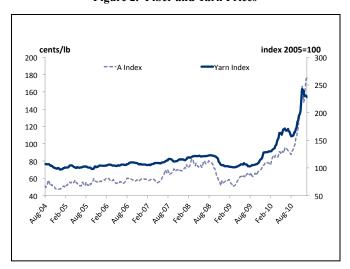
Descriptive Statistics

With the approach described in the previous section, it is possible to obtain a theoretical description of what could be expected in terms of the effect of changes in retail prices given the recent increase in cotton fiber prices. In reality, however, textile supply chains are complex. Many firms involved in the textile industry are non-vertical, with manufacturers at one stage often having to purchase their raw materials from manufacturers at previous stages. In order to track the effect of the recent sharp increase in cotton prices on the textile supply chain, prices at each stage in the supply chain are examined and discussed in this section.

Fiber-to-Yarn

Price data for fiber and yarn are widely available from a range of national and trade sources. In order to frame discussion at the global level, the A Index and yarn index from Cotlook were used in this fiber-to-yarn portion of the analysis. Between August and December 2010, the A Index doubled from values near 85 cents/lb to values over 170 cents/lb (Figure 2). Over the same time period, values for the yarn index increased 45%.

Figure 2. Fiber and Yarn Prices



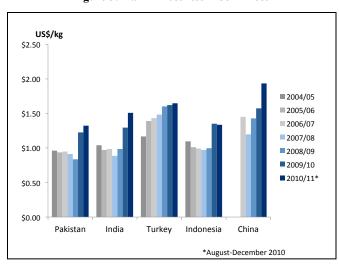
Source: Cotlook

With cotton fiber prices quoted in terms of cents/lb and yarn prices quoted in terms of currency/weight, it is possible to directly compare fiber and yarn prices in terms currency/unit. Cotlook regularly publishes yarn price data for several countries in terms of USD/kg. After converting cotton fiber prices to USD/kg, the difference between yarn and fiber prices can be examined to look at the extent to which changes in fiber prices are passed through to yarn prices. These differences appear in Figure 3.

January-February 2011

What is evident in Figure 3 is that the difference between fiber prices and yarn prices widened in both the 2009/10 and the 2010/11 crop years. Cotton prices first began to consistently rally in March 2009, with the most dramatic increases in prices occurring after the onset of the 2010/11 crop year. The widening of the yarn-fiber difference suggests that the increases in fiber prices have been passed through the yarn stage. Also during this time period, there have been increases in labor, energy, and other costs associated with spinning. Correspondingly, these results should not be interpreted as margins. Rather, they should be taken as evidence of pass-through of cotton prices.

Figure 3. Yarn Prices less Fiber Prices



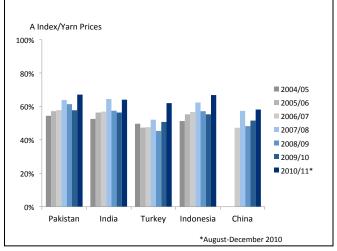
Source: Cotlook

Another way of looking at the relationship between fiber and yarn prices is to look at fiber prices as a percentage of yarn prices. In Figure 4, it is notable that the proportion of yarn prices that comes from fiber prices was about five percent higher in 2010/11 than it was in 2008/09 and 2009/10. The other spike in the proportion of yarn prices that is accounted for by fiber prices was in 2007/08, the last time that cotton prices saw consistent increases.

Additionally, it seems useful to examine temporal correlations between yarn and fiber prices. Typically spinning mills will hold several months of inventory. As a result, cotton will not likely be transformed into yarn until several months after it was purchased. This may lead to expectations that yarn prices will have a lagged correlation with fiber prices. However, the results in Figure 5 show that the strongest correlation between yarn and fiber prices is with contemporaneous prices (fiber and yarn prices from the same month).

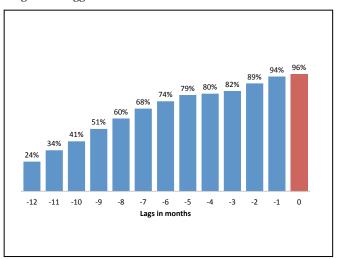
To further investigate the temporal relationship between fiber and yarn prices, rolling correlations can be used. The results shown in Figure 6 represent rolling correlations between contemporaneous fiber and yarn prices over 100week time periods. What is evident from Figure 6 is that the contemporaneous correlation between fiber and yarn prices has

Figure 4. Fiber Prices as a Percentage of Yarn Prices



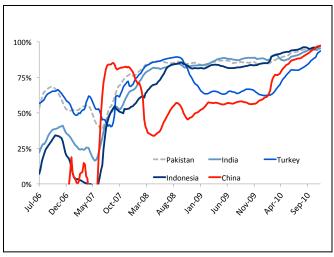
Source: Cotlook

Figure 5. Lagged Correlations between Fiber and Yarn Prices



Source: Cotlook

Figure 6. Rolling Correlations between Fiber and Yarn Prices



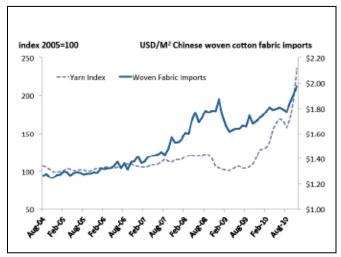
Source: Cotlook

strengthened to levels approaching 100% in the most recent data. This indicates that as cotton prices increased sharply over the past few months, yarn prices also increased sharply. In combination with the results concerning the yarn-fiber differences, it could be inferred that the recent fiber prices are not only being passed-through, but that they are being passed-through almost immediately.

Yarn-to-Fabric

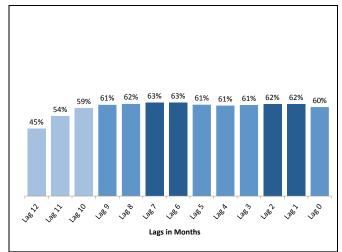
Given that fiber prices appear to have been passed-through to the fiber-to-yarn link in the supply chain, it could be expected that effects of the increase in fiber prices will also be evident in fabric price data. To examine fabric prices, the average cost per square meter equivalent of woven cotton fabric into China was used. At the time of publication, the latest data available for Chinese imported fabric were from November 2010.

Figure 7. Yarn and Fabric Prices



Sources: Cotlook, Global Trade Atlas

Figure 8. Lagged Correlations between Yarn and Fabric Prices



Sources: Cotlook, Global Trade Atlas

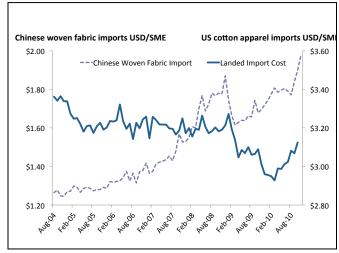
In November 2010, the woven fabric prices were 12% higher than they were in August 2010 (Figure 7), when the sharp increase in fiber prices began. Considering that fabric prices are derived from trade data, the full effect of the increase in fiber prices may have yet to surface. Due to the time necessary for manufacture, fabric negotiated for orders during the runup in prices in the last quarter of 2010 have not been imported into China yet. As a result, some of the increases reported from industry sources to be as high as 30% have yet to surface in trade figures for fabric prices. The temporal correlation structure in Figure 8, where correlations of about 60% exist between lags of one to ten months, suggests that changes in yarn prices may take some time to fully affect fabric prices.

Fabric-to-Garment

Significant transformation occurs at the garment manufacturing stage of the cotton supply chain. At this stage, fabric is cut and sewn in order to assemble complete garments. Finishes and dyeing are also applied. More labor is required at this stage in the apparel manufacturing process than at any other. With the time lag and value added at the garment assembly stage, and with fabric prices showing only some evidence of the effect of the recent increase in cotton prices, it could be expected that there would not be much evidence of the recent movement in cotton prices on prices for assembled garments.

Price data indicate that there has not been much upward movement in garment prices that could be traced to movement in fiber prices. In the latest data available from OTEXA for U.S. cotton-dominant apparel imports (through October 2010), average imported prices increased only one percent since August 2010. Examining the pattern of movement in imported garment prices, it appears that this movement could be reflective of a rebound in price per square meter equivalent of imported apparel following the decrease that occurred during the recession rather than from the recent run-

Figure 9. Fabric and Garment Prices



Sources: Global Trade Atlas, OTEXA

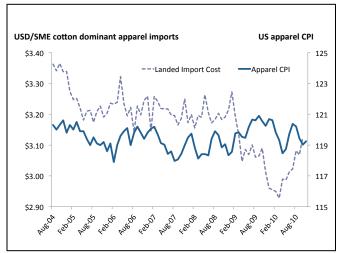
January-February 2011

up in cotton prices. There is little evidence of correlation, regardless of the lag, between fabric and garment prices. Due to the lack of correlation between fabric and garment prices, a chart analogous to those in Figures 5 and 8 is not shown. The lagged correlations between fabric and garment prices are even weaker than they are at the garment-to-retail stage (Figure 11).

Garment-to-Retail

While there were periods of decline in the average costs of imported apparel, the general pattern for retail apparel prices has been relatively flat for the time period under investigation, with movements of only one to two percent. Over the past decade, U.S. apparel prices have fallen with increased trade liberalization and price pressures from the emergence of mass merchant retailers. In the latest data for November 2010, the apparel CPI was about one percent lower than it was in August 2010, when the recent sharp increase in fiber prices began.

Figure 10. Garment and Retail Prices

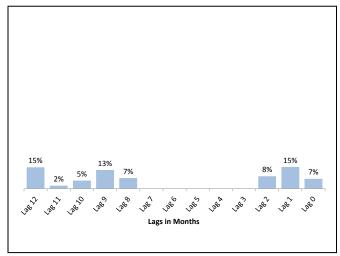


Sources: OTEXA, U.S. Bureau of Labor Statistics

As was the case at the fabric-to-garment link in the supply chain, the relationship between garment and retail prices is weak, even when examined over a range of lagged correlations (Figure 11). One potential reason for the weakness in correlation is the magnitude of retail prices relative to the magnitude of imported apparel prices. The average landed or import cost/unit for two commonly purchased cotton apparel items, t-shirts and jeans, was \$1.80 and \$7.60 in 2009. Meanwhile, the average retail prices for these items in 2009

were \$19.90 and \$36.40 (Cotton Incoportated). The breadth of the difference between the garment costs and retail prices suggests some ability for retailers to absorb fluctuations in garment prices. It should be emphasized, however, that the average retail prices presented are the average prices collected across all retail channels. Mass merchants, whose business strategies rely on higher volumes of lower margin goods, would have relatively less ability to absorb higher garment prices than specialty retailers who can sell garments at higher retail prices.

Figure 11. Garment Costs and Retail Prices



Sources: OTEXA, U.S. Bureau of Labor Statistics

Conclusions

The sharp increases in cotton prices that began with the onset of the 2010/11 crop year have been unprecedented and led to a series of record cotton prices across the globe. Findings suggest that the sharp increases in cotton fiber prices in the last quarter of 2010 have resulted in increases in yarn and fabric prices, but have yet to influence prices for assembled garments or retail prices for cotton apparel. However, according to the results from the theoretical pass-through analysis, if the only increase in cost throughout the textile value chain were the increase in cotton fiber prices, then the magnitude of the increase in retail prices would be small⁵. Furthermore, due to the fact that it may take several months for the full effect of the recent increases in fiber prices to appear in price data for garment and retail stages of the supply chain, the final effect for the average U.S. consumer would be negligible.



⁵⁾ These conclusions are in line with those from Mr. Driscoll's article "Comment- Two Tier Pricing?" published in this edition of the Review.

COMMENT - TWO-TIER PRICING?

By Peter Driscoll6

The textiles industry has watched amazed as the shortage of cotton translated in early November 2010 to record prices, not only for natural fiber, but also polyester staple, and, as raw materials followed, across to polyester filament and then to some extent to acrylic, nylon and viscose. The switch to polyester/cotton is most pronounced in China where the domestic market is more accepting of synthetics. Polyester staple rose there from RMB9,700 in early September 2010 to RMB20,000 in the second week of November before falling back steadily to RMB12,000 during December, but by mid-January 2011 it had firmed again, reaching RMB14,500 and still showing some strength, supported as well by higher oil prices.

China was offering polyester staple for export at \$1.18 per kg FOB in early September 2010 but \$2.76 by 10 November, before falling back to \$2.25-2.50, and then \$2.10. In practice, little export volume was done above \$2.00, with overseas buyers pushing instead for \$1.65-1.70 per kg FOB. In mid-January 2011 the regional market in Asia, after some fluctuation, was just under \$2.00 per kg FOB.

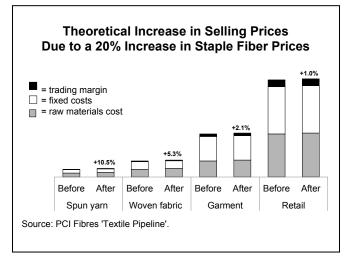
Clearly, China's mills can still buy at high prices, whereas in other countries this might not be the case unless contract commitments outweigh all other considerations.

As of mid-January 2011 liquidity and volumes remained high in China, although retail prices for clothing were sluggish, being down for 2010 by 1% in a market that is beginning to see some inflation in other products.

Outside China, consumer demand is more subdued and retailers must be greatly concerned regarding the impact of high fiber prices. Price moves at the fiber level have to be quite large to show up at retail, but this might now be the case. Until the consumer responds however, particularly in China, it will be difficult to determine whether fiber prices and volumes can hold at present levels. And this might not become clear until the second quarter of 2011.

A theoretical analysis of the pass-through of higher staple fiber prices throughout the textile supply chain by PCI Fibres indicates that an average 20% increase across all staple fiber prices could result, on average, in a 10.5% increase across spun yarn prices, a 5.3% increase across woven fabric prices, a 2.1% increase across garment prices, and a 1% increase across apparel prices at the retail level. These calculations account for the cost of the raw materials, fixed costs and trading margins at each stage of the value chain. The trading margin, as a percentage of the overall price is assumed constant before and after the increase in raw material prices at 4% for spun yarn, 4.5% for woven fabric, 6% for garments, and 7% for apparel at retail. A sensitivity analysis indicates that if staple fiber prices increase by 50%, retail prices could increase by 2.5%.

With some clothing types this would not be a great issue but in the price-sensitive mass market the large retailers are usually watching every penny, and such an increase might meet considerable resistance. But to what extent remains to be seen.





⁶⁾ Managing Director, PCI Fibres. May House, The Warren, Mayfield, East Sussex TN20 6UB, England, E-mail: info@pcifibres.com; www.pcifibres.com. 7) PCI Fibres (2010). Fibres Report: A Monthly Review of Synthetics Worldwide. Report No. 267. November.

ESTIMATING MINIMUM GLOBAL COTTON STOCKS FOR 2010/11 BASED ON PRODUCTION AVAILABILITY

By Hunter Colby, James Johnson, James Kiawu, Leslie Meyer, and Carol Skelly8

Background and Purpose

The U.S. Department of Agriculture (USDA) estimates supply, demand, and stocks for over 100 cotton producing and consuming countries for an August 1-July 31 marketing year⁹. World cotton stocks fell sharply during 2009/10 as world production declined while demand recovered. USDA estimates that the world produced just over 22 million tons in 2009/10; at the same time, the recovery in textile demand from recessionary lows was surprisingly strong, resulting in consumption of nearly 26 million tons. The rebound in consumption was driven by the need to replenish low textile inventories and by growth in demand by consumers in developing countries, especially China and India, where incomes are rising rapidly. The net result of these developments was a 28-percent drawdown in world stocks to about 9.5 million tons. The estimated stocks-to-use ratio of 0.37 was the smallest since 1993/94. Prices rose throughout 2009/10, and the New York December 2010 futures contract reached almost 80 cents per pound.

USDA's January 2011 estimates for 2010/11 reflect a rationing of supplies to meet demand, resulting in sharply higher world prices. World production is expected to rise 14 percent due to a combination of higher cotton prices at planting time and more favorable weather conditions; however, overall world supplies are similar to 2009/10 due to much lower beginning stocks. With supplies insufficient to meet demand, world cotton consumption is expected to fall nearly 2 percent despite rising consumer demand. Competition to secure scarce supplies is the main factor boosting both U.S. and world prices to record levels—the New York March 2011 futures contract exceeded \$1.60 in late January 2011. In this situation, determination of the minimum stocks required to maintain mill operations at the beginning of 2011/12 has become critical to both ICAC and USDA in estimating global supply and demand.

The purpose of this analysis is to estimate supply availability at the point of consumption during the early months of the 2011/12 marketing year, in order to determine the minimum stocks needed on July 31, 2011 to avoid disruption of mill operations. With consumption exceeding new-crop availability

in the early months of the marketing year, the study indicates that the seasonal low point for world stocks is October 31. Thus, ending stocks on July 31 must cover mill requirements during August-October and provide the minimum level of stocks required on October 31.

Preliminary results indicate that a minimum of about 9.3 million tons of stocks will be needed on July 31, 2011 to keep mills operating until the 2011 crop is available, a level comparable to USDA's January 2011 forecast. However, this projection is affected by a number of variables and assumptions which are subject to change based on further analysis and market developments.

Methods

Using USDA's estimates for supply and demand by country--including historical data, January 2011 estimates, and some early projections for 2011/12--a monthly schedule of supply available to mills at the point of consumption was developed for: (1) countries that supply over half of their own consumption (producer-consumer countries); and (2) countries that rely primarily on imports (importing countries). Crop calendars were developed for the major cotton-producing countries, and lags in delivery of the cotton to the point of consumption were estimated based on the destination of the cotton either domestically or for export. Sources used to estimate supply availability included: (1) crop calendars developed by USDA's Foreign Agricultural Service (see http://www.pecad.fas.usda. gov); (2) official data on ginning and classing for several major cotton-producing countries; (3) reports of harvest and ginning progress from Cotlook, Ltd. and trade sources; and (4) official country data on imports and exports.

The timing of availability of traded cotton was based on delivery to Far Eastern mills. Once the monthly availability of supply was developed, a comparison of monthly supply to consumption indicated that the seasonal low point for world stocks is October 31. Projections of mill requirements for August-October 2011, net of new-crop supply availability, resulted in a calculation of the minimum stocks needed on July 31, 2011 in order to avoid market disruption.

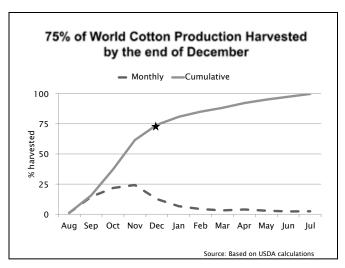
⁸⁾ Economists, U.S. Department of Agriculture, Washington, DC

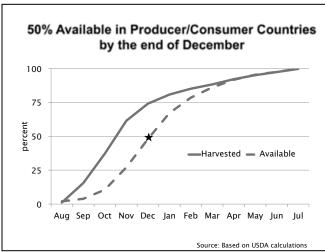
⁹⁾ All estimates in this report are USDA's, and they might differ from ICAC estimates.

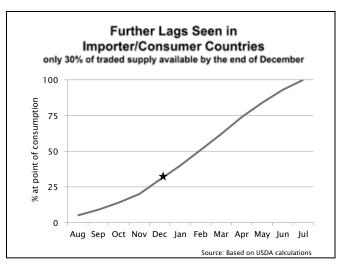
Availability of Production at the Point of Consumption

A handful of countries produce about 90 percent of the world's cotton, including China, India, the United States, Pakistan, Brazil, Australia, Turkey, and the countries of Central Asia and West Africa. Crop calendars for these countries, weighted by their 2010/11 estimated production levels, indicate that 37 percent of cotton is harvested during the months of August-October, rising to just under 75 percent by the end of December.

Mills in countries which supply most of their own consumption generally have access to cotton sooner than mills in countries that rely primarily on imports. For mills in these cotton-producing countries, which include China, India, Pakistan, Turkey, Brazil, and the United States, supply availability is a function of their harvest calendars plus lags for ginning and transport to mills. Some countries have the capacity to gin and transport cotton shortly after harvest while others have longer ginning seasons. Estimation of lags indicates that about 11 percent of the cotton supply in these "producer-consumer countries" is available at mills by the end of October, and just







under 50 percent by the end of December.

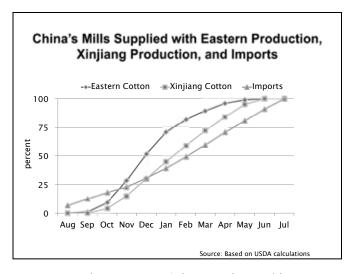
An estimated 55 percent of world consumption is accounted for by mills in countries that rely primarily on imported cotton. Supply availability to these mills depends on the harvest calendars in producing countries and lags in processing, shipping, and delivery to the importer. In addition, competition from domestic mills in the producing countries may affect the timing of supplies available for export. Since the majority of traded cotton consumption is shipped to mills in the Far East, the analysis estimates lags in delivery of cotton from the major exporting countries to Far Eastern mills.

Given the current strong demand and limited world supplies, the world's major northern hemisphere exporters are under pressure to accelerate shipments in 2010/11, leaving lower balances available in the early months of 2011/12. At the same time, however, sharply higher production in southern hemisphere countries, such as Brazil and Australia, will help to cushion the impact. USDA's January 2011 estimates include an increase of about 750,000 tons in southern hemisphere stocks during 2010/11, and much of this cotton is expected to be available to importing countries during the key August-October 2011 period.

China's Special Circumstances

China is the world's largest producer and consumer of cotton; however, since production is less than consumption, China is also the world's largest importer. Delivery of China's domestic production varies according to the production region. The majority of China's mills, accounting for about 96 percent of China's consumption, are located in eastern China, where over half of the cotton is produced. Eastern China production can be delivered to these mills within a month or so of ginning, approximating the availability schedules of other producer-consumer countries. In contrast, about 45 percent of China's production is produced in the far northwestern Xinjiang Autonomous Region. Although most Xinjiang production is harvested and ginned by the end of December, availability in the east is limited by a shortage of rail cars to transport the

January-February 2011

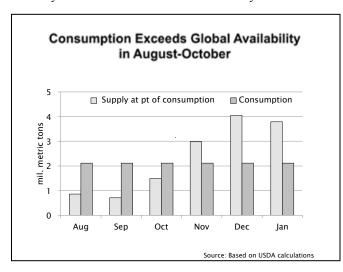


cotton. Based on past years' data, maximum shipments are estimated at 380,000 tons per month, or about 12 percent of the region's production, thereby delaying the flow of cotton to the point of consumption.

Since China is also heavily reliant on imports, a portion of its consumption depends upon the timing of world exports, giving it a third availability schedule. For the purposes of estimating world supplies available at the point of consumption, China's eastern production is included in the producer-consumer category, while Xinjiang production is included with imported cotton, due to its later availability.

Determining a Seasonal Low Point for World Stocks

In general, with limited supplies available from both newcrop production and imports in the fall months, world stocks are drawn down during the period July-October, reaching a seasonal low point at the end of October. For the fall of 2011, a deficit of 3.3 million tons is projected for October 31. This calculation is based on nearly 2.2 million tons per month of world consumption, for a 3-month total of 6.5 million tons, offset by about 1.6 million tons of availability from the 2011-

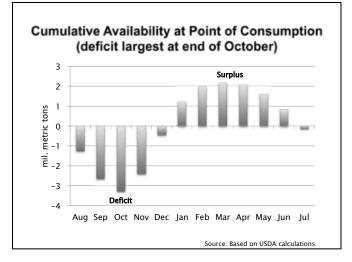


crop harvest and 1.6 million tons of exports which will be delivered during the August-October period.

Projecting a Minimum Stocks Level for July 31, 2011

In order for mills to continue to operate without supplyinduced disruption, ending stocks on July 31 must be adequate to: (1) fill the shortfall in monthly supplies between July 31 and the end of October, and (2) provide for the minimum mill and pipeline stocks that are needed on October 31. As stated above, world consumption is estimated at nearly 2.2 million tons per month in the fall of 2011, for a total of 6.5 million tons for August-October. In addition, mills are assumed to require a minimum of one month's equivalent of use in stocks on hand plus another month's equivalent of use in the delivery pipeline to replace the on-hand stocks as they are used in the subsequent month. The pipeline includes all stocks held by non-mill entities, including producers and merchants, plus stocks in transit to the point of consumption. Thus, the total supply requirement for August-October 2011 is projected at just under 11 million tons.

Supplies available at the point of consumption from new-crop production are projected at 1.6 million tons. The source of the additional 1.6 million tons of imports arriving at mills in August-October is mainly 2010-crop production already captured as July 31 stocks in the exporting countries; therefore, the imported cotton is excluded from the calculation of minimum stocks. The resulting projection of minimum stocks on July 31, 2011 is approximately 9.3 million tons (slightly below 11 million tons required less 1.6 million tons of new-crop availability), similar to USDA's January 2011 world stocks forecasts.



Topics for Further Study and Analysis

This study was undertaken to provide an independent method for estimating the minimum stocks needed in the context of

(continued on pag. 18)

2009/10 SUPPLY AND USE OF COTTON BY COUNTRY

February 1, 2011

	AREA	YIELD	PROD	BEG STKS	IMPORTS	CONS	EXPORTS	END STKS	S/U *	S/MU **
	000 Ha	Kgs/Ha			000 Metr	ic ions			Ratio	Ratio
CANADA				2	2	3		0	0.16	0.16
CUBA	4	269	1	1	2	3		1	0.19	0.19
DOM. REP.					1	1			0.47	0.47
MEXICO	69	1,313	90	185	305	420	15	145	0.33	0.35
USA N. America	3,047 3,125	871	2,654	1,380 1,567	210	754	2,621	642	0.19	0.85
N. America	3,125	879	2,746	1,567	310	1,181	2,636	789	0.21	0.67
EL SALVADOR				5	26	26		5	0.20	0.20
GUATEMALA				6	21	21		6	0.27	0.27
HONDURAS	0	316	0	.1	5	5		1	0.14	0.14
C. America	2	510	1	12	52	53		12	0.22	0.22
ARGENTINA	441	510	225	102	17	170	11	162	0.90	0.96
BOLIVIA	5	523	3	2	9	9	3	2	0.21	0.26
BRAZIL	836	1,429	1,194	1,050	36	1,002	433	680	0.47	0.68
CHILE	27	740	07	3	9	10	0	2	0.21	0.21
COLOMBIA ECUADOR	37 1	748 429	27 1	32 9	50 16	95 16	0	14 9	0.15 0.53	0.15 0.53
PARAGUAY	18	286	5	9	10	7	4	3	0.33	0.36
PERU	28	880	25	34	62	90	2	29	0.32	0.33
URUGUAY	23	000	_0	0	0	0	_	0	0.26	0.26
VENEZUELA	15	357	6	14	15	19	2	14	0.66	0.74
S. America	1,381	1,076	1,485	1,255	214	1,418	455	915	0.49	0.65
ALGERIA				4	10	10		4	0.37	0.37
EGYPT	121	785	95	90	52	130	76	31	0.15	0.24
MOROCCO				9	34	34		9	0.26	0.26
SUDAN	27	403	11	37		1	37	9	0.23	8.60
TUNISIA				3	9	10		2	0.24	0.24
N. Africa	148	715	106	142	105	184	113	54	0.18	0.30
BENIN	149	459	68	45		4	85	24	0.27	5.98
BURKINA FASO	420	362	152	84		4	182	50	0.27	12.48
CAMEROON	97	505	49	34		2	57	23	0.39	10.27
CENT. AFR. REP.	20	201	4	0			3	1	0.28	40.00
CHAD	98	142	14	28		2 5	21	19	0.87	12.89
COTE D'IVOIRE GUINEA	187 13	432 262	81 4	20 1		5	75 3	20 1	0.25 0.41	4.04
MADAGASCAR	13	202	4	3			3	3	0.41	
MALI	250	396	99	34		3	105	25	0.23	8.32
NIGER	5	435	2	0		1			0.12	0.25
SENEGAL	23	350	8	4		1	9	2	0.17	2.17
TOGO	42	273	11	7			14	4	0.28	
F. Africa	1,304	377	492	259		22	556	173	0.30	8.05
ANGOLA	2	293	1	0		1		0	0.12	0.12
ETHIOPIA	75	234	18	37	1	25	2	29	1.06	1.15
GHANA	7	357	3	3		2		1	0.34	0.84
KENYA	42	254	11	5	1	12		5	0.43	0.43
MALAWI	20	240	5	16		2	11	. 8	0.63	3.61
MOZAMBIQUE	125	185	23	15	0	1	23	14	0.61	14.42
NIGERIA SOUTH AFRICA	132 9	225 942	30 8	22 9	2 17	22 23	20 6	12 6	0.28 0.23	0.54 0.28
TANZANIA	365	164	60	93	17	24	70	59	0.23	2.47
UGANDA	70	186	13	14		1	18	8	0.03	6.72
CONGO. DR	, 0	100	10	2	8	8	.0	2	0.27	0.27
ZAMBIA	180	160	29	17	3	J	36	10	0.28	ŭ. = .
ZIMBABWE	340	309	105	64		11	86	72	0.74	6.73
S. Africa	1,388	222	309	302	48	153	275	231	0.54	1.51
KAZAKHSTAN	140	536	75	28	5	12	81	15	0.17	1.26
KYRGYZSTAN	17	824	14	14	3	2	25	4	0.15	2.01
TAJIKISTAN	170	481	82	60		10	96	37	0.35	3.84
TURKMENISTAN	607	412	250	179		90	235	104	0.32	1.16
UZBEKISTAN	1,317	645	850	502	1	270	790	293	0.28	1.09
C. Asia	2,251	565	1,271	784	9	384	1,226	454	0.28	1.18



2009/10 SUPPLY & USE OF COTTON BY COUNTRY (cont'd) February 1, 2011

NUSTRIAN ALERBAILAN BELGUIM	· · ·	AREA	YIELD	PROD	BEG STKS	IMPORTS	CONS	EXPORTS	END STKS	S/U *	S/MU **
AZERBALIAN 29 379 11 13 12 10 2 0.09 0.17 EBLARIUS BLICHUM 1 321 0 5 12 9 3 1 1 0.09 0.12 EBLARIUS 1 321 0 5 12 9 3 1 1 0.09 0.12 CECH REP 0 0 0 0 0 0 0 0.15 EBLARIUS EBLARIUS 0 0 1 12 9 3 1 1 0.09 0.12 CECH REP 0 0 0 0 0 0 0 0.15 EBLARIUS EBLARIUS FINLAND FINLAND 1 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0											
AZERBALIAN 29 379 11 13 12 10 2 0.09 0.17 EBLARIUS BLICHUM 1 321 0 5 12 9 3 1 1 0.09 0.12 EBLARIUS 1 321 0 5 12 9 3 1 1 0.09 0.12 CECH REP 0 0 0 0 0 0 0 0.15 EBLARIUS EBLARIUS 0 0 1 12 9 3 1 1 0.09 0.12 CECH REP 0 0 0 0 0 0 0 0.15 EBLARIUS EBLARIUS FINLAND FINLAND 1 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0	ΔΙΙζΤΡΙΔ				1	1	1		0	0.08	0.08
BELARUS BELGIUM 1 321 0 1 1 12 9 3 1 1 0.09 0.34 BULGARIAP COEMMARK ESTONIA FINLAND FRANCE CERNARY COEMMARK ESTONIA FINLAND FRANCE CERNARY COEMMARK ESTONIA FINLAND FRANCE COEMMARK ESTONIA FINLAND FRANCE COEMMARK ESTONIA FINLAND COEMMARK		29	379	11		4		10			
BELGIUM BULGARIA 1 321 0 5 12 12 12 1 4 0.28 0.33 CZECH REP CEINMARK FINLAND FRANCE FINLAND FRANCE FINLAND FRANCE FRANCE GERNANY GERNA		20	0/0			11		10			
BULCARIA 1 321 0 5 12 12 1 4 0.28 0.32 0.45 CECH REP. 6 10 9 3 4 0.33 0.45 CECH REP. 6 10 9 3 4 0.33 0.45 CECH REP. 6 10 9 3 4 0.33 0.45 CECH REP. 6 10 9 3 4 0.33 0.45 CECH REP. 6 10 9 3 4 0.33 0.45 CECH REP. 7 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0								3			
CZECH REP DENNARK ESTONIA FINLAND FINL		1	321	0							
DENMARK ESTONIA FINLAND FRANCH STORY		•	021	Ŭ							
ESTONIA FRIANCE FRANCE GERMARY 234 919 215 68 37 38 32 011 017 GRIECER GERMARY 234 919 215 68 37 38 37 60 014 017 017 016 017 017 017 017 017 017 017 017 017 017					Ŭ	10	ŭ	Ü	·	0.00	0.10
FINLAND FRANCE GERMANY											
FRANCE GERMANY 919 919 215 66 3 40 220 24 0.91 0.15 0.16 GREECE 234 919 215 66 3 40 220 24 0.99 0.06 0.01 0.16 0.17 0.17 0.17 0.18 0.18 0.18 0.18 0.18 0.18 0.18 0.18						0	0				
GERMANY GREECE 234 919 215 66 33 40 220 24 0.09 0.66 HINGARY RELAND 0 1 1 2 0 0 0.15 0.16 TITLIT RELAND 1 1 1 57 53 5 10 0.12 0.15 TITLIT RELAND 1 1 1 57 53 5 10 0.12 0.15 TITLIT RELAND 1 1 1 2 2 1 1 0.34 MOLDOVA 1 1 2 2 1 1 0.34 MOLDOVA 1 1 2 2 1 1 0.34 MOLDOVA 1 1 2 2 1 1 0.34 NORWAY POLAND 1 7 7 6 1 0.11 0.11 PORTUGAL 7 36 37 6 0.18 0.18 NORWAY POLAND 1 7 7 7 6 0.18 0.18 NORWAY POLAND 1 7 7 7 6 0.18 0.18 NORWAY POLAND 1 7 7 7 6 0.18 0.18 NORWAY POLAND 1 7 7 7 6 0.18 0.18 NORWAY POLAND 1 7 7 7 6 0.18 0.18 NORWAY POLAND 2 7 8 8 371 22 6 2 11 1 14 5 0.18 SWEDEN SWEDEN 3 1 31 3 8 5 3 0.00 SWITZERLAND 4 8 184 189 4 4 0.23 0.28 SWITZERLAND 3 3 1 0.38 NORWAY 2 1 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0					2			3	2	0 11	0.13
GREECE 234 919 215 66 3 40 220 24 0.09 0.05 0.01 1 2 1 0 0.01 0.01 0.01 0.01 0.01 0											
HUNGARY 0		234	919	215							
IRELAND											
ITALY											
LATVIA LITHUANIA 0 0 0 0 0 0 0 0.32 0.32 MOLDOVA 1 1 2 2 2 1 1 0.34 NORWAY FOLIAND NORWAY FOLIAND 1 7 7 7 1 0.11 PORTUGAL 7 7 86 37 6 0.18 0.18 0.18 0.19 0.20 0.20 0.20 0.20 0.20 0.20 0.30 0.30								5			0.19
LITHUANIA MOLDOVA 1 1 2 2 3 1 0.34 NETHERLANDS NOTIMERLANDS NORWAY POLAND PORTUGAL 7 7 66 37 6 0.58 ROMANIA											
MOLDOVA NETHERLANDS NORWAY POLAND POLAND POLAND 1 7 7 7 1 0.11 0.11 PORTUGAL ROMANIA 1 1 7 7 7 1 1 0.11 0.11 PORTUGAL ROMANIA 1 1 1 2 1 1 0.26 RUSSIA SLOVAR REP. SPAIN SPAIN SPAIN SPAIN SPAIN SWITZERLAND 0 3 3 3 0 0 0.11 0.23 SWITZERLAND 0 3 3 3 0 0 0.11 0.12 SWITZERLAND 0 3 3 3 0 0 0.11 0.12 SWITZERLAND 0 3 3 3 0 0 0.11 0.12 SWITZERLAND 0 3 3 3 0 0 0 0.11 0.12 SWITZERLAND 0 3 3 3 0 0 0 0.11 0.12 SWITZERLAND 0 3 3 3 0 0 0 0.11 0.12 SWITZERLAND 0 3 3 3 0 0 0 0.11 0.12 SWITZERLAND 0 2 8 8 2 0 0.23 SWITZERLAND 0 1 3 3 3 0 0 0 0.11 0.12 SWITZERLAND 0 2 8 8 2 0 0.25 SWITZERLAND 0 2 8 8 8 2 0 0.25 SWITZERLAND 0 2 8 8 8 2 0 0.25 SWITZERLAND 0 2 9 474 274 122 0.12 0.25 SWITZERLAND 0 2 1 8 8 8 0 0 0.23 SWITZERLAND 0 2 1 8 8 8 0 0 0.23 SWITZERLAND 0 3 3 3 3 0 0 0 0.11 0.12 SWITZERLAND 0 3 3 3 0 0 0 0.11 0.12 SWITZERLAND 0 3 3 3 0 0 0 0.11 0.12 SWITZERLAND 0 2 8 8 8 2 0 0.25 SWITZERLAND 0 3 8 9 248 192 429 474 274 122 0.12 0.25 SWITZERLAND 0 2 1 2 2 8 8 8 2 0 0.25 SWITZERLAND 0 0 0 0 0 0 0 0.28 SWITZERLAND 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0											
NETHERLANDS NORWAY POLAND POLAND PORTUGAL 1 7 7 7 1 0.11 0.11 ROMANIA 1 1 1 2 1 1 0.26 0.26 ROMANIA ROMANIA 1 1 1 2 1 1 0.26 0.26 ROMANIA ROMANIA 1 1 1 2 1 1 0.26 0.26 ROMANIA ROMANIA 1 1 1 2 1 1 0.26 0.26 ROMANIA ROMANIA 1 1 1 2 1 1 0.26 0.26 ROMANIA ROMANIA 1 1 1 2 0 1 0.26 0.26 ROMANIA ROMA											
NORWAY POLAND POLAND 1 1 7 7 7 1 1 0.11 0.11 PORTUGAL ROMANIA 1 1 1 2 1 1 0.26 RUSSIA SLOVAK REP. SPAIN SSWITZERLAND 0 0 3 3 3 0 0 0.11 0.12 SWITZERLAND UKIRGHOR UKRAINE 3 133 8 5 3 0.20 SWITZERLAND UKIRGHOR 0 3 3 13 8 5 3 0.20 SWITZERLAND UKIRGHOR 0 0 3 3 3 0 0 0.11 0.12 UKIRGHOR 0 0 3 3 3 0 0 0.01 0.11 0.12 UKIRGHOR 0 0 3 3 3 0 0 0 0.11 0.12 UKIRGHOR 0 0 3 3 3 0 0 0 0.11 0.12 UKIRGHOR 0 0 3 13 8 5 3 0.20 UKIRGHOR 0 0 13 8 6 6 0 13 0.21 UKIRGHOR 0 0 13 8 6 6 0 13 0.21 UKIRGHOR 0 0 13 8 6 6 0 13 0.21 UKIRGHOR 0 0 13 8 6 6 0 13 0.21 UKIRGHOR 0 0 13 8 6 6 0 13 0.21 UKIRGHOR 0 0 1 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0							_	3			
POLAND PORTUGAL ROMANIA ROMANI											
PORTUGAL ROMANIA ROMAN					1	7	7		1	0.11	0.11
ROMANIA RUSSIA SIA SIA SIA SIA SIA SIA SIA SIA SIA											
RUSSIA SLOVAK REP. SPAIN 58 371 22 6 2 111 14 5 0.23 0.23 SWITZERLAND 0 3 3 3 0 0 0 0.111 0.12 WITZERLAND 0 3 3 3 3 0 0 0 0.111 0.12 WITZERLAND 0 3 3 13 8 5 3 0 0.21 SWITZERLAND 0 0 3 3 3 3 0 0 0 0.111 0.12 WITZERLAND 0 0 3 3 3 3 0 0 0 0 0.11 0.12 UNITZERLAND 0 0 3 3 3 3 0 0 0 0 0.11 0.12 SWITZERLAND 0 0 0.21 FORMER YUGOSLAVIA 0 0.21 FORMER YUGOSLAVIA 0 0.21 FORMER YUGOSLAVIA 0 0.22 0.25 0.25 Europe 1323 769 248 192 429 474 274 122 0.12 0.26 Including EU-27 293 869 237 120 207 238 259 66 0.13 0.28 CHINA 5.364 1.277 6.850 3.585 2.374 9.867 5 2.937 0.30 0.33 TAIWAN 54 221 215 6 0 0.28 0.28 HONG KONG 54 221 215 6 0 0.28 0.28 HONG KONG 52 2.855 20 67 20 0.23 1.00 Sub total 5.364 1.277 6.850 3.662 2.680 10,102 72 3.017 0.30 0.33 HUGONESIA 9 703 6 99 464 461 4 104 0.22 0.23 JAPAN 3 6 6 66 75 2 70 0.36 0.35 JAPAN 3 6 6 66 75 2 70 0.36 0.35 JAPAN 3 6 6 66 75 2 70 0.36 0.35 JAPAN 3 6 6 66 75 2 70 0.36 0.35 JAPAN 40 40 40 40 40 40 KOREA, REP. 43 220 220 43 0.19 0.19 0.19 HILLIPPINES 0 5 558 0 2 15 5 5 2 0.01 0.02 0.22 PHILLIPPINES 0 5 558 0 2 15 5 5 2 0.01 0.02 0.22 PHILLIPPINES 0 5 58 0 2 15 5 5 2 0.01 0.02 0.22 PHILLIPPINES 0 5 58 0 1 1 33 3 1 0.24 THAILAND 2 5 508 1 833 393 390 1 85 0.22 0.22 PHILLIPPINES 0 5 58 0 2 1 15 15 2 0.017 0.17 0.17 SINGAPORE 1 1 3 3 3 1 0.24 THAILAND 2 5 508 1 833 393 390 1 85 0.22 0.22 PHILLIPPINES 0 4 40 40 40 40 40 40 40 40 40 40 40 40											
SLOVAK REP. SPAIN 58 371 22 6 2 11 14 5 0.18 0.42 SWEDEN SWITZERLAND 0 3 3 3 0 0 0 0.11 URRAINE URRAINE URRAINE URRAINE URRED SWITZERLAND 0 3 3 3 0 0 0 0.11 URRAINE URRAINE URRED SWITZERLAND 0 3 3 3 0 0 0 0.01 0.21 URRAINE URRAINE URRAINE URRAINE 0 2 8 8 8 2 0.25 0.25 Leurope 12 28 8 8 2 0.25 0.25 12 0.25 0.25 12 0.25 0.25 12 0.25 0.25 0.25 0.25 12 0.25 0											
SPAIN 58 371 22 6 2 11 14 5 0.18 0.42 SWEDEN 0.23 SWITZERLAND 0 3 3 3 0 0 0 0.11 0.12 URRAINE 3 13 8 5 3 0.20 0.32 UNITED KINGDOM FORMER YUGOSLAVIA 2 8 8 6 2 0.25 0.25 Europe 10.21 Including EU-27 293 809 237 120 207 238 259 66 0.13 0.28 CHINA 5.364 1.277 6.850 3.855 2.374 9.867 5 2.937 0.30 0.30 1.34 MAN 5 5 0.25 0.25 1.30 1.30 1.30 1.30 1.30 1.30 1.30 1.30							.00		• • •	0.20	0.20
SWEDEN SWITZERLAND URRAINE USA SWITZERLAND URRAINE UNTED KINGDOM FORMER YUGOSLAVIA Europe 323 769 248 192 429 474 274 274 122 0.25 0.25 11coluding EU-27 293 809 237 120 207 238 259 66 0.13 0.28 CHINA 5,364 1,277 6,850 3,585 2,374 9,867 5 2,937 0.30 0.30 17aiwan 160 Sub total 5,364 1,277 6,850 3,662 2,680 10,102 72 3,017 0.30 0.30 AUSTRALIA 100 Sub total 5,364 1,277 6,850 3,662 2,680 10,102 72 3,017 0.30 0.30 AUSTRALIA 100 Sub total 5,364 1,277 6,850 3,662 2,680 10,102 72 3,017 0.30 0.30 AUSTRALIA 100 Sub total 5,364 1,277 6,850 3,662 2,680 10,102 72 3,017 0.30 0.30 AUSTRALIA 208 1,861 387 197 0 99 464 491 400 115 0.24 12,24 110 110 110 110 110 110 110 110 110 11		58	371	22	6	2	11	14	5	0.18	0.42
SWITZERLAND URRAINE URRAINE 3 13 8 5 3 0 0 0.11 0.12 URRAINE COMPANY CLOSCAVIA URRAINE 3 13 8 5 3 0.20 0.32 UNITED KINGDOM FORMER YUGSCLAVIA 2 8 8 8 2 0.25 0.25 Europe 3 23 769 248 192 429 474 274 122 0.12 0.26 Including EU-27 293 809 237 120 207 238 259 66 0.13 0.28 CHINA 5 364 1,277 6,850 3.585 2,374 9,867 5 2,937 0.30 0.33 TAIWAN 5 5,364 1,277 6,850 3.585 2,374 9,867 5 2,937 0.30 0.33 TAIWAN 6 4 221 215 6 60 0.28 0.28 HONG KONG 7 2 85 20 67 20 0.23 1.00 Sub total 5,364 1,277 6,850 3,662 2,680 10,102 72 3,017 0.30 0.33 AUSTRALIA 1 208 1,861 387 197 0 9 460 115 0.24 12.34 INDONESIA 9 703 6 99 464 461 4 104 0.22 0.23 JAPAN 6 9 464 461 4 104 0.22 0.23 JAPAN 6 6 6 75 2 70 0.36 0.36 KOREA, D.R. 1 1 534 6 4 5 11 4 4 0.40 0.46 KOREA, D.R. 1 1 534 6 4 5 11 4 0.40 0.40 MALAYSIA 9 53 52 10 0.20 MALAYSIA 9 53 52 10 0.20 1 30 19 0.40 MALAYSIA 9 53 52 10 0.20 1 31 0.20 MALAYSIA 9 53 52 10 0.20 1 31 0.20 MALAYSIA 9 53 52 10 0.20 1 31 0.20 MALAYSIA 1 3 3 1 0.24 THAILAND 2 5 508 1 83 393 390 1 85 0.22 0.22 AFGHANISTAN 8 456 4 61 363 355 73 0.21 0.27 SINGAPORE 1 1 3 3 1 0.24 THAILAND 2 5 508 1 83 393 390 1 85 0.22 0.22 AFGHANISTAN 8 456 4 61 363 355 73 0.21 0.27 E. Asia 247 1,664 411 536 1,582 1,594 469 466 0.23 0.23 AFGHANISTAN 50 410 20 40 4 4 27 29 0.93 6.96 BANGLADESH 32 348 11 169 775 794 162 0.20 0.22 MYANMARR 310 209 65 34 47 17 34 0.52 0.77 SRICADOR 44 57 79 2 0.02 SRISAN 15 666 71 44 59 140 35 0.22 0.22 S. ASIA 13,833 518 7,168 2,740 1,234 7,379 1,619 2,144 0.24 0.29 S. RISAN 15 666 71 44 59 140 35 0.25 SINGAD 20 355 7 1 6 6 13 7 7 2 0.22 SINGAD 20 355 7 1 6 6 13 7 7 2 0.22 SINGAD 20 355 7 1 6 6 13 7 7 2 0.22 SINGAD 20 355 7 1 6 6 13 7 7 2 0.22 S. ASIA 13,10 649 2,109 579 336 2,307 154 473 0.99 0.90 SIRAEL 4 1,762 7 2 7 2 0.22 S. ASIA 13,10 649 2,109 579 336 2,307 154 473 0.99 0.90 SIRAEL 4 1,762 7 2 7 2 0.22 S. ASIA 13,10 649 2,109 579 336 2,307 154 473 0.90 SIRAEL 4 1,762 7 2 7 2 0.22 S. ASIA 13,10 649 2,109 579 336 2,307 154 473 0.90 SIRAEL 4 1,762 7 2 7 2 0.22 S. ASIA 13,10 649 2,109		00	· · ·		· ·	_			ŭ		v <u>-</u>
UNTED KINGDOM FORMER YUGOSLAVIA LINITED KINGDOM LINITED KINGDO					0	3	3	0	0		0 12
UNITED KINGDOM FORMER YUGOSLAVIA FORMER YUGOSLAV											
FORMER YUGOSLAVIA Europe Europe Saza 769 248 192 429 474 274 122 0.12 0.25 Including EU-27 293 809 237 120 207 238 259 66 0.13 0.28 CHINA 5,364 1,277 6,850 3,585 2,374 9,867 5 2,937 0.30 0.30 TAIWAN 54 221 215 60 0.28 0.28 HONG KONG 222 85 20 67 20 0.23 1.00 Sub total 5,364 1,277 6,850 3,662 2,680 10,102 72 3,017 0.30 0.30 AUSTRALIA 208 1,861 387 197 0 9 460 115 0.24 12.34 INDONESIA 9 703 6 99 464 461 4 104 0.22 0.23 JAPAN 66 4 5 11 4 104 0.22 0.23 JAPAN 703 6 4 5 11 4 104 0.22 0.23 JAPAN 86 66 75 27 0.36 0.36 KOREA, D.R. 11 534 6 4 5 11 4 4 0.40 0.24 JAPAN 9 53 52 10 0 0.20 HILIPPINES 0 558 0 2 15 15 2 0.17 0.17 0.17 SINGAPORE 1 1 3 3 3 1 0.24 THAILAND 2 5 508 1 83 393 390 1 85 0.22 VIETNAM 8 456 4 61 363 355 73 0.21 0.22 VIETNAM 8 456 4 61 363 355 73 0.21 0.22 VIETNAM 8 456 4 61 363 355 73 0.21 0.22 VIETNAM 8 456 4 61 363 355 73 0.21 0.22 VIETNAM 8 456 4 61 363 355 73 0.21 0.22 VIETNAM 8 456 4 61 363 355 73 0.21 0.22 VIETNAM 8 456 4 61 363 355 73 0.21 0.22 VIETNAM 8 456 4 61 363 355 73 0.21 0.22 VIETNAM 8 456 4 61 363 355 73 0.21 0.22 VIETNAM 8 456 4 61 363 355 73 0.21 0.22 VIETNAM 8 456 4 61 363 355 73 0.21 0.22 VIETNAM 8 456 4 61 363 355 73 0.21 0.22 VIETNAM 8 456 4 61 363 355 73 0.21 0.22 VIETNAM 8 456 4 61 363 355 73 0.21 0.22 VIETNAM 8 456 4 61 363 355 73 0.21 0.22 VIETNAM 8 70 70 70 70 70 70 70 70 70 70 70 70 70					· ·		· ·	ū	ŭ		0.02
Europe Including EU-27 323 769 248 192 429 474 274 122 0.12 0.28 CHINA 5,364 1,277 6,850 3,585 2,374 9,867 5 2,937 0.30 0.30 TAIWAN 5,364 1,277 6,850 3,585 2,374 9,867 5 2,937 0.30 0.30 TAIWAN 5,364 1,277 6,850 3,662 2,285 20 67 20 0.23 1.00 AUSTRALIA 208 1,861 387 197 0 9 460 115 0.24 12,34 INDONESIA 9 703 6 99 494 461 4 104 0.22 0.23 JAPAN 3 6 69 9 464 461 4 104 0.40 0.44 KOREA, DR 11 534 6 4 5 11 4 0.40 0.44 <td></td> <td></td> <td></td> <td></td> <td>2</td> <td>8</td> <td>8</td> <td></td> <td>2</td> <td></td> <td>0.25</td>					2	8	8		2		0.25
Including EU-27		323	769	248				274			
TAIWAN HONG KONG Sub total 5,364 1,277 6,850 3,662 2,680 10,102 72 3,017 0,30 0,30 0,30 0,30 0,30 0,30 0,30 0,3	-										0.28
TAIWAN HONG KONG Sub total 5,364 1,277 6,850 3,662 2,680 10,102 72 3,017 0,30 0,30 0,30 0,30 0,30 0,30 0,30 0,3	CHINA	5 364	1 277	6.850	3 585	2 374	9 867	5	2 937	0.30	0.30
HONG KONG Sub total 5,364 1,277 6,850 3,662 2,680 10,102 72 3,017 0.30 0.30 0.30 AUSTRALIA AUSTRALIA 208 1,861 387 197 0 9 460 410 104 0.22 0.23 JAPAN 806 66 75 27 0.36 0.38 KOREA, D.R. 11 534 6 4 5 11 4 4 40 40 40 40 40 40 40		0,004	1,211	0,000				0			
Sub total 5,364 1,277 6,850 3,662 2,680 10,102 72 3,017 0.30 0.30 AUSTRALIA 208 1,861 387 197 0 9 460 115 0.24 12.34 INDONESIA 9 703 6 99 464 461 4 104 0.22 0.23 JAPAN 36 6 75 27 0.36 0.36 KOREA, D.R. 11 534 6 4 5 11 4 0.40 0.46 KOREA, REP. 43 220 220 43 0.19 0.15 MALAYSIA 9 53 52 10 0.20 0.22 PHILIPPINES 0 558 0 2 15 15 2 0.17 0.17 SINGAPORE 1 83 393 390 1 85 0.22 0.22 VIETNAM 8 456 4 </td <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td>67</td> <td></td> <td></td> <td></td>								67			
AUSTRALIA 208 1,861 387 197 0 9 460 115 0,24 12.34 10DONESIA 9 703 6 99 464 461 4 104 0,22 0,23 JAPAN KOREA, D.R. 11 534 6 4 4 5 11 4 4 4 404 KOREA, REP. 43 220 220 43 0,19 0,18 MALAYSIA 9 53 52 10 0,20 0,20 17 17 18INGAPORE 1 1 3 3 1 0,24 THAILAND 2 VIETNAM 8 456 4 61 363 363 355 73 0,21 0,21 0,22 17 18.64 411 536 1,582 1,594 469 466 0,23 0,28 AFGHANISTAN 50 410 20 420 422 1,420 1,445 0,26 0,34 MYANMAR 310 209 65 34 47 17 34 0,52 0,72 PAKISTAN 3,110 649 2,019 579 336 2,307 154 473 0,19 0,20 1,445 0,26 0,34 MYANMAR 310 209 65 34 47 17 34 0,52 0,72 PAKISTAN 3,110 649 2,019 579 336 2,307 154 473 0,19 0,22 1,824 1,834 1,833 518 7,168 2,740 1,234 7,379 1,619 2,144 0,24 0,28 SYRIA 181 1,206 218 98 492 1,048 1,677 72 490 0,29 0,28 NORLD TOTAL 29,980 726 21,778 11,942 7,712 24,614 7,767 8,867 0,36		5 364	1 277	6.850							
INDONESIA 9 703 6 99 464 461 4 104 0.22 0.23 0.36 0.36 0.66 75 0.7 0.36	oub total	3,304	1,277	0,000	3,002	2,000	10,102	/2	3,017	0.50	0.50
JAPAN KOREA, D.R. 11 534 6 4 5 11 4 0.40 0.40 KOREA, REP. MALAYSIA	AUSTRALIA	208	1,861	387	197	0	9	460	115	0.24	12.34
KOREA, D.R. KOREA, REP. MALAYSIA 9 53 52 10 0.20 220 17 0.17 21 0.1	INDONESIA	9	703	6	99	464	461	4	104	0.22	0.23
KOREA, REP. MALAYSIA 9 53 52 10 0.20 0.20 PHILIPPINES 0 558 0 2 15 15 2 0.17 0.17 SINGAPORE 1 3 393 390 1 85 0.22 0.22 VIETNAM 8 456 4 61 363 355 73 0.21 0.21 E. Asia 247 1,664 411 536 1,582 1,594 469 466 0.23 AFGHANISTAN 50 410 20 40 4 27 29 0.93 6.96 BANGLADESH 32 348 11 169 775 794 162 0.20 0.20 INDIA 10,329 489 5,050 1,917 120 4,222 1,420 1,445 0.26 0.34 MYANMAR 310 209 65 34 47 17 34 0.52 0.72 SRI LANKA 50 40 2,019 579 336 2,307 154 473 0.19 0.21 SRI LANKA 0 2 2 2 0 0.22 S. Asia 13,833 518 7,168 2,740 1,234 7,379 1,619 2,144 0.24 0.29 IRAN 105 676 71 44 59 140 35 0.25 0.25 IRAQ 20 355 7 1 6 13 1 0.29 IRAN 105 676 71 44 59 140 35 0.25 0.25 IRAQ 20 355 7 1 6 13 1 1 0.09 0.09 ISRAEL 4 1,762 7 2 7 2 0.22 SYPRIA 181 1,206 218 98 185 50 81 0.34 TURKEY 280 1,357 380 338 955 1,300 10 363 0.28 0.28 SUB DOTAL VORLD TOTAL 29,980 726 21,778 11,942 7,712 24,614 7,767 8,867 0.36 0.36	JAPAN				36	66	75		27	0.36	0.36
MALAYSIA 9 53 52 10 0.20 0.20 PHILIPPINES 0 558 0 2 15 15 2 0.17 0.17 SINGAPORE 1 3 3 1 0.24 17 0.11 0.22 0.22 0.22 0.22 0.22 0.22 0.22 0.29 0.25 0.25 0.25 0.25 0.25 0.27 0.22 0.22 0.22 0.22 0.22 <td>KOREA, D.R.</td> <td>11</td> <td>534</td> <td>6</td> <td>4</td> <td>5</td> <td>11</td> <td></td> <td>4</td> <td>0.40</td> <td>0.40</td>	KOREA, D.R.	11	534	6	4	5	11		4	0.40	0.40
PHILIPPINES 0 558 0 2 15 15 15 2 0.17 0.17 SINGAPORE 1 1 3 3 3 1 0.24 THAILAND 2 2 508 1 83 393 390 1 85 0.22 0.22 VIETNAM 8 456 4 61 363 355 73 0.21 0.21 E. Asia 247 1,664 411 536 1,582 1,594 469 466 0.23 0.29 AFGHANISTAN 50 410 20 40 4 27 29 0.93 6.96 BANGLADESH 32 348 11 169 775 794 162 0.20 0.20 INDIA 10,329 489 5,050 1,917 120 4,222 1,420 1,445 0.26 0.34 MYANMAR 310 209 65 34 47 17 34 0.52 0.72 PAKISTAN 3,110 649 2,019 579 336 2,307 154 473 0.19 0.21 SRI LANKA 0 2 2 2 0 0 0.22 S. Asia 13,833 518 7,168 2,740 1,234 7,379 1,619 2,144 0.24 0.29 IRAN 105 676 71 44 59 140 35 0.25 0.25 IRAQ 20 355 7 1 6 13 1 0.09 0.9 ISRAEL 4 1,762 7 2 7 2 0.22 SYRIA 181 1,206 218 98 185 50 81 0.34 0.44 TURKEY 280 1,357 380 338 955 1,300 10 363 0.28 0.28 Sub total 29,980 726 21,778 11,942 7,712 24,614 7,767 8,867 0.36 0.36	KOREA, REP.				43	220	220		43	0.19	0.19
SINGAPORE 1 3 3 1 0.24 THAILAND 2 508 1 83 393 390 1 85 0.22 0.22 VIETNAM 8 456 4 61 363 355 73 0.21 0.21 E. Asia 247 1,664 411 536 1,582 1,594 469 466 0.23 0.28 AFGHANISTAN 50 410 20 40 4 27 29 0.93 6.96 BANGLADESH 32 348 11 169 775 794 162 0.20 0.20 INDIA 10,329 489 5,050 1,917 120 4,222 1,420 1,445 0.26 0.34 MYANMAR 310 209 65 34 47 17 34 0.52 0.72 PAKISTAN 3,110 649 2,019 579 336 2,307 154	MALAYSIA				9	53	52		10	0.20	0.20
THAILAND 2 508 1 83 393 390 1 85 0.22 0.22 VIETNAM 8 456 4 61 363 355 73 0.21 0.21 E. Asia 247 1,664 411 536 1,582 1,594 469 466 0.23 0.29 AFGHANISTAN 50 410 20 40 4 27 29 0.93 6.96 BANGLADESH 32 348 11 169 775 794 162 0.20 0.20 MYANMAR 10,329 489 5,050 1,917 120 4,222 1,420 1,445 0.26 0.34 MYANMAR 310 209 65 34 47 17 34 0.52 0.72 PAKISTAN 3,110 649 2,019 579 336 2,307 154 473 0.19 0.21 SRI LANKA 0 2 2 2 0 0 0.22 S. Asia 13,833 518 7,168 2,740 1,234 7,379 1,619 2,144 0.24 0.29 IRAN 105 676 71 44 59 140 35 0.25 0.25 IRAQ 20 355 7 1 6 13 1 0.09 0.98 ISRAEL 4 1,762 7 2 7 2 7 2 0.22 SYRIA 181 1,206 218 98 185 50 81 0.34 0.44 TURKEY 280 1,357 380 338 955 1,300 10 363 0.28 0.28 Sub total 29,980 726 21,778 11,942 7,712 24,614 7,767 8,867 0.36 0.36	PHILIPPINES	0	558	0	2	15	15		2	0.17	0.17
VIETNAM 8 456 4 61 363 355 73 0.21 0.21 E. Asia 247 1,664 411 536 1,582 1,594 469 466 0.23 0.29 AFGHANISTAN 50 410 20 40 4 27 29 0.93 6.96 BANGLADESH 32 348 11 169 775 794 162 0.20 0.20 INDIA 10,329 489 5,050 1,917 120 4,222 1,420 1,445 0.26 0.34 MYANMAR 310 209 65 34 47 17 34 0.52 0.72 PAKISTAN 3,110 649 2,019 579 336 2,307 154 473 0.19 0.21 SRI LANKA 0 2 2 0 0.22 0.22 0 0.22 0.22 S. Asia 13,833 518 7,168	SINGAPORE				1	3		3	1	0.24	
E. Asia 247 1,664 411 536 1,582 1,594 469 466 0.23 0.29 AFGHANISTAN 50 410 20 40 4 27 29 0.93 6.96 BANGLADESH 32 348 11 169 775 794 162 0.20 0.20 INDIA 10,329 489 5,050 1,917 120 4,222 1,420 1,445 0.26 0.34 MYANMAR 310 209 65 34 47 17 34 0.52 0.72 PAKISTAN 3,110 649 2,019 579 336 2,307 154 473 0.19 0.21 SRI LANKA 0 0 2 2 2 0 0 0.22 S. Asia 13,833 518 7,168 2,740 1,234 7,379 1,619 2,144 0.24 0.29 IRAN 105 676 71 44 59 140 35 0.25 0.25 IRAQ 20 355 7 1 6 13 1 0.09 0.09 ISRAEL 4 1,762 7 2 7 2 7 2 7 2 0.22 SYRIA 181 1,206 218 98 185 50 81 0.34 0.44 TURKEY 280 1,357 380 338 955 1,300 10 363 0.28 0.28 Sub total 29,980 726 21,778 11,942 7,712 24,614 7,767 8,867 0.36 0.36	THAILAND	2	508	1	83	393	390	1	85	0.22	0.22
AFGHANISTAN 50 410 20 40 4 27 29 0.93 6.96 BANGLADESH 32 348 11 169 775 794 162 0.20 0.20 INDIA 10,329 489 5,050 1,917 120 4,222 1,420 1,445 0.26 0.34 MYANMAR 310 209 65 34 47 17 34 0.52 0.72 PAKISTAN 3,110 649 2,019 579 336 2,307 154 473 0.19 0.21 SRI LANKA 0 0 2 2 2 0 0 0.22 0.22 S. Asia 13,833 518 7,168 2,740 1,234 7,379 1,619 2,144 0.24 0.29 IRAN 105 676 71 44 59 140 35 0.25 0.25 IRAQ 20 355 7 1 6 13 1 0.09 0.09 ISRAEL 4 1,762 7 2 7 2 7 2 0.22 SYRIA 181 1,206 218 98 185 50 81 0.34 0.44 TURKEY 280 1,357 380 338 955 1,300 10 363 0.28 0.28 Sub total 29,980 726 21,778 11,942 7,712 24,614 7,767 8,867 0.36 0.36	VIETNAM	8	456	4	61	363	355		73	0.21	0.21
BANGLADESH 32 348 11 169 775 794 162 0.20 0.20 INDIA 10,329 489 5,050 1,917 120 4,222 1,420 1,445 0.26 0.34 MYANMAR 310 209 65 34 47 17 34 0.52 0.72 PAKISTAN 3,110 649 2,019 579 336 2,307 154 473 0.19 0.21 SRI LANKA 0 2 2 0 0.22 0.22 0 0.22 0.22 S. Asia 13,833 518 7,168 2,740 1,234 7,379 1,619 2,144 0.24 0.29 IRAN 105 676 71 44 59 140 35 0.25 0.25 IRAQ 20 355 7 1 6 13 1 0.09 0.09 ISRAEL 4 1,762 7 2 7 2 0.22 SYRIA 181 1,206 218 <td>E. Asia</td> <td>247</td> <td>1,664</td> <td>411</td> <td>536</td> <td>1,582</td> <td>1,594</td> <td>469</td> <td>466</td> <td>0.23</td> <td>0.29</td>	E. Asia	247	1,664	411	536	1,582	1,594	469	466	0.23	0.29
BANGLADESH 32 348 11 169 775 794 162 0.20 0.20 INDIA 10,329 489 5,050 1,917 120 4,222 1,420 1,445 0.26 0.34 MYANMAR 310 209 65 34 47 17 34 0.52 0.72 PAKISTAN 3,110 649 2,019 579 336 2,307 154 473 0.19 0.21 SRI LANKA 0 2 2 0 0.22 0.22 0 0.22 0.22 S. Asia 13,833 518 7,168 2,740 1,234 7,379 1,619 2,144 0.24 0.29 IRAN 105 676 71 44 59 140 35 0.25 0.25 IRAQ 20 355 7 1 6 13 1 0.09 0.09 ISRAEL 4 1,762 7 2 7 2 0.22 SYRIA 181 1,206 218 <td>AFGHANISTAN</td> <td>50</td> <td>410</td> <td>20</td> <td>40</td> <td></td> <td>4</td> <td>27</td> <td>29</td> <td>0.93</td> <td>6.96</td>	AFGHANISTAN	50	410	20	40		4	27	29	0.93	6.96
INDIA 10,329 489 5,050 1,917 120 4,222 1,420 1,445 0.26 0.34 MYANMAR 310 209 65 34 47 17 34 0.52 0.72 PAKISTAN 3,110 649 2,019 579 336 2,307 154 473 0.19 0.21 PAKISTAN 3,110 649 2,019 579 336 2,307 154 473 0.19 0.21 SRI LANKA 0 2 2 0 0.22 0.22 S. Asia 13,833 518 7,168 2,740 1,234 7,379 1,619 2,144 0.24 0.29 IRAN 105 676 71 44 59 140 35 0.25 0.25 IRAQ 20 355 7 1 6 13 1 0.09 0.09 ISRAEL 4 1,762 7 2 7 2 7 2 0.22 SYRIA 181 1,206 218 98 185 50 81 0.34 0.44 TURKEY 280 1,357 380 338 955 1,300 10 363 0.28 0.28 Sub total 624 1,120 698 492 1,048 1,677 72 490 0.29 0.29 WORLD TOTAL 29,980 726 21,778 11,942 7,712 24,614 7,767 8,867 0.36 0.36 0.36 O 34 0.44 0.44 0.44 0.44 0.44 0.44 0.44 0.44 0.44 TURKEY 280 1,357 380 338 955 1,300 10 363 0.28 0.28 Sub total 624 1,120 698 492 1,048 1,677 72 490 0.29 0.29 WORLD TOTAL 29,980 726 21,778 11,942 7,712 24,614 7,767 8,867 0.36 0.36 0.36						775					
MYANMAR 310 209 65 34 47 17 34 0.52 0.72 PAKISTAN 3,110 649 2,019 579 336 2,307 154 473 0.19 0.21 SRI LANKA 0 2 2 0 0.22 0.22 S. Asia 13,833 518 7,168 2,740 1,234 7,379 1,619 2,144 0.24 0.29 IRAN 105 676 71 44 59 140 35 0.25 0.25 IRAQ 20 355 7 1 6 13 1 0.09 0.09 ISRAEL 4 1,762 7 2 7 2 0.22 SYRIA 181 1,206 218 98 185 50 81 0.34 0.44 TURKEY 280 1,357 380 338 955 1,300 10 363 0.28 0.28								1 420			
PAKISTAN 3,110 649 2,019 579 336 2,307 154 473 0.19 0.21 SRI LANKA 0 2 2 2 0 0.22 0.22 S. Asia 13,833 518 7,168 2,740 1,234 7,379 1,619 2,144 0.24 0.29 IRAN 105 676 71 44 59 140 35 0.25 0.25 IRAQ 20 355 7 1 6 13 1 0.09 0.09 ISRAEL 4 1,762 7 2 7 2 0.22 SYRIA 181 1,206 218 98 185 50 81 0.34 0.44 TURKEY 280 1,357 380 338 955 1,300 10 363 0.28 0.28 Sub total 624 1,120 698 492 1,048 1,677 72 49						3					
SRI LANKA 0 2 2 2 0 0.22 0.22 S. Asia 13,833 518 7,168 2,740 1,234 7,379 1,619 2,144 0.24 0.29 IRAN 105 676 71 44 59 140 35 0.25 0.25 IRAQ 20 355 7 1 6 13 1 0.09 0.09 ISRAEL 4 1,762 7 2 7 2 0.22 SYRIA 181 1,206 218 98 185 50 81 0.34 0.44 TURKEY 280 1,357 380 338 955 1,300 10 363 0.28 0.28 Sub total 624 1,120 698 492 1,048 1,677 72 490 0.29 0.29 WORLD TOTAL 29,980 726 21,778 11,942 7,712 24,614 7,767						336					
S. Asia 13,833 518 7,168 2,740 1,234 7,379 1,619 2,144 0.24 0.29 IRAN 105 676 71 44 59 140 35 0.25 0.25 IRAQ 20 355 7 1 6 13 1 0.09 0.09 ISRAEL 4 1,762 7 2 7 2 0.22 SYRIA 181 1,206 218 98 185 50 81 0.34 0.44 TURKEY 280 1,357 380 338 955 1,300 10 363 0.28 0.28 Sub total 624 1,120 698 492 1,048 1,677 72 490 0.29 0.29 WORLD TOTAL 29,980 726 21,778 11,942 7,712 24,614 7,767 8,867 0.36 0.36		3,113	0.10	_,0.0				104			
IRAQ 20 355 7 1 6 13 1 0.09 0.09 ISRAEL 4 1,762 7 2 7 2 0.22 SYRIA 181 1,206 218 98 185 50 81 0.34 0.44 TURKEY 280 1,357 380 338 955 1,300 10 363 0.28 0.28 Sub total 624 1,120 698 492 1,048 1,677 72 490 0.29 0.29 WORLD TOTAL 29,980 726 21,778 11,942 7,712 24,614 7,767 8,867 0.36 0.36		13,833	518	7,168				1,619			0.29
IRAQ 20 355 7 1 6 13 1 0.09 0.09 ISRAEL 4 1,762 7 2 7 2 0.22 SYRIA 181 1,206 218 98 185 50 81 0.34 0.44 TURKEY 280 1,357 380 338 955 1,300 10 363 0.28 0.28 Sub total 624 1,120 698 492 1,048 1,677 72 490 0.29 0.29 WORLD TOTAL 29,980 726 21,778 11,942 7,712 24,614 7,767 8,867 0.36 0.36	IDAN	10F	676	74	11	50	140		25	0.25	0.25
ISRAEL 4 1,762 7 2 7 2 0.22 SYRIA 181 1,206 218 98 185 50 81 0.34 0.44 TURKEY 280 1,357 380 338 955 1,300 10 363 0.28 0.28 Sub total 624 1,120 698 492 1,048 1,677 72 490 0.29 0.29 WORLD TOTAL 29,980 726 21,778 11,942 7,712 24,614 7,767 8,867 0.36 0.36											
SYRIA 181 1,206 218 98 185 50 81 0.34 0.44 TURKEY 280 1,357 380 338 955 1,300 10 363 0.28 0.28 Sub total 624 1,120 698 492 1,048 1,677 72 490 0.29 0.29 WORLD TOTAL 29,980 726 21,778 11,942 7,712 24,614 7,767 8,867 0.36 0.36						О	13	-			0.09
TURKEY 280 1,357 380 338 955 1,300 10 363 0.28 0.28 Sub total 624 1,120 698 492 1,048 1,677 72 490 0.29 0.29 WORLD TOTAL 29,980 726 21,778 11,942 7,712 24,614 7,767 8,867 0.36 0.36							105				0.44
Sub total 624 1,120 698 492 1,048 1,677 72 490 0.29 0.29 WORLD TOTAL 29,980 726 21,778 11,942 7,712 24,614 7,767 8,867 0.36 0.36						055					
WORLD TOTAL 29,980 726 21,778 11,942 7,712 24,614 7,767 8,867 0.36 0.36											
	oud total	624	1,120	698	492	1,048	1,6/7	/2	490	0.29	0.29
	WORLD TOTAL	29,980	726	21,778	11,942	7,712	24,614	7,767	8,867	0.36	0.36

^{*/} Ending stocks divided by consumption plus exports.

Subtotals and total include countries not shown.

^{**/} Ending stocks divided by consumption.



2010/11 SUPPLY AND USE OF COTTON BY COUNTRY

February 1, 2011

	AREA	YIELD	PROD	BEG STKS	IMPORTS	CONS	EXPORTS	END STKS	S/U *	S/MU **
	000 Ha	Kgs/Ha			000 Metr	ic ions			Ratio	Ratio
CANADA				0	2	2		0	0.11	0.11
CUBA	4	269	1	1	2	3		1	0.19	0.19
DOM. REP.	44-	4.075	450		1	1		101	0.47	0.47
MEXICO	117	1,275	150	145	264	412	14	134	0.32	0.33
USA N. America	4,333 4,459	920 928	3,987 4,140	642 789	270	784 1,203	3,407 3,421	438 574	0.10 0.12	0.56
N. America	4,459	920	4,140	709	210	1,203	3,421	574	0.12	0.48
EL SALVADOR				5	26	26		5	0.20	0.20
GUATEMALA			_	6	21	21		6	0.27	0.27
HONDURAS	0	316	0	1	5	5		1	0.14	0.14
C. America	2	510	1	12	52	53		12	0.22	0.22
ARGENTINA	665	400	266	162	10	173	55	210	0.92	1.21
BOLIVIA	5	525	3	2	9	9	3	2	0.21	0.26
BRAZIL	1,215	1,511	1,835	680	150	1,041	526	1,098	0.70	1.05
CHILE	44	925	24	2	10	10	0	2	0.21	0.21
COLOMBIA ECUADOR	41 1	825 431	34 1	14 9	62 16	95 16	0	14 9	0.15 0.53	0.15 0.53
PARAGUAY	30	333	10	3	10	7	4	2	0.33	0.33
PERU	34	885	30	29	60	90	5	25	0.14	0.28
URUGUAY				0	0	0		0	0.26	0.26
VENEZUELA	15	361	6	14	15	19	2	14	0.66	0.74
S. America	2,006	1,088	2,184	915	333	1,461	595	1,376	0.67	0.94
ALGERIA				4	10	10		4	0.37	0.37
EGYPT	157	842	133	31	65	130	74	25	0.12	0.19
MOROCCO				9	34	34		9	0.26	0.26
SUDAN	38	555	21	9		. 1	20	9	0.41	8.60
TUNISIA N. Africa	195	707	154	2 54	10	10 184	94	2 48	0.24	0.24 0.26
N. AIrica	195	787	154	54	118	104	94	40	0.17	0.26
BENIN	182	465	85	24		4	80	24	0.29	6.04
BURKINA FASO	450	422	190	50		4	180	56	0.31	14.10
CAMEROON CENT. AFR. REP.	145 27	430 203	62 6	23 1		2	60 5	24 2	0.38 0.32	10.46
CHAD	160	150	24	19		2	28	14	0.32	9.03
COTE D'IVOIRE	220	430	95	20		5	86	24	0.26	4.73
GUINEA	13	262	4	1			4	1	0.40	
MADAGASCAR				3				3		
MALI	260	421	109	25		3	106	25	0.23	8.43
NIGER	5	439	2	0		1	40	0	0.12	0.25
SENEGAL TOGO	25 61	1,040 276	26 17	2 4		1	18 16	8 5	0.44 0.30	10.83
F. Africa	1,548	400	619	173		22	584	186	0.31	8.67
	•									
ANGOLA	3	296	1	0		1		0	0.16	0.19
ETHIOPIA GHANA	79 9	236 378	19 3	29	1	24 1	2	23	0.88 0.30	0.95
KENYA	42	256	ە 11	1 5		12		1 4	0.30	1.05 0.37
MALAWI	80	300	24	8		2	13	17	1.18	7.68
MOZAMBIQUE	127	187	24	14		1	22	15	0.63	14.81
NIGERIA	300	228	68	12	1	20	40	22	0.37	1.11
SOUTH AFRICA	16	780	12	6	12	21	5	5	0.21	0.26
TANZANIA	493	200	60	59		24	60	35	0.42	1.47
UGANDA	100	300	30	8	0	1	24	12	0.48	10.65
CONGO, DR ZAMBIA	270	170	46	2 10	8	8	39	2 17	0.27 0.43	0.27
ZIMBABWE	415	295	122	72		11	100	83	0.43	7.78
S. Africa	1,953	217	425	231	43	147	310	242	0.73	1.64
KAZAKHOTANI	110	E00	70	4.5	_	40	64	40	0.47	0.00
KAZAKHSTAN KYRGYZSTAN	140 20	500 750	70 15	15 4	5 3	13 2	64 17	13 3	0.17 0.15	0.99 1.46
TAJIKISTAN	165	545	90	37	3	8	93	26	0.13	3.38
TURKMENISTAN	698	480	335	104		115	220	104	0.20	0.91
UZBEKISTAN	1,330	752	1,000	293	1	273	827	195	0.18	0.71
C. Asia	2,353	642	1,510	454	9	411	1,221	341	0.21	0.83



2010/11 SUPPLY & USE OF COTTON BY COUNTRY (cont'd) February 1, 2011

AUSTRIA AUGUSTRIA AU		AREA	YIELD	PROD	BEG STKS	IMPORTS	CONS	EXPORTS	END STKS	S/U *	S/MU **
## ACTERNALIAN 30 460 14 2 12 3 0 0.03 0.08 ## BELLARUS 1 321 0 4 11 11 11 4 4 0.34 0.34 0.34 0.35 ## BELLARUS 1 321 0 4 11 10 8 2 1 0.12 0.12 ## DEMMARK SETIONIAN 1 10 10 8 2 1 0.12 0.12 ## DEMMARK SETIONIAN 1 10 10 8 2 1 0.12 0.12 ## DEMMARK SETIONIAN 1 10 10 8 2 1 0.12 0.12 ## DEMMARK SETIONIAN 1 10 10 10 0 ## BELLARUS 0 0 0 ## BELLARUS 0 0 0 ## BELLARUS 0 0 0 0 0 0 ## BELLARUS 0 0 0 0 0 0 0 0 0		000 Ha	Kgs/Ha			000 Meti	ric Tons			Ratio	Ratio
## ACTERNALIAN 30 460 14 2 12 3 0 0.03 0.08 ## BELLARUS 1 321 0 4 11 11 11 4 4 0.34 0.34 0.34 0.35 ## BELLARUS 1 321 0 4 11 10 8 2 1 0.12 0.12 ## DEMMARK SETIONIAN 1 10 10 8 2 1 0.12 0.12 ## DEMMARK SETIONIAN 1 10 10 8 2 1 0.12 0.12 ## DEMMARK SETIONIAN 1 10 10 8 2 1 0.12 0.12 ## DEMMARK SETIONIAN 1 10 10 10 0 ## BELLARUS 0 0 0 ## BELLARUS 0 0 0 ## BELLARUS 0 0 0 0 0 0 ## BELLARUS 0 0 0 0 0 0 0 0 0	AUSTRIA				0	4	4		0	0.09	0.09
BELARUS BELGIUM 1 321 0 4 111 11 1 4 0.34 0.34 BUIGARIA 1 321 0 4 111 11 11 1 3 0.22 0.2 BUIGARIA 1 321 0 4 111 11 11 1 3 0.22 0.2 BUIGARIA BUIGARIA 1 321 0 4 111 11 11 1 1 3 0.22 0.2 BUIGARIA BETONIA FINLAND FRANCE BETONIA FINLAND FRANCE BETONIA FRANCE BETONIA FRANCE BETONIA FRANCE BETONIA FRANCE BETONIA BETONIA FRANCE BETONIA BETO		30	460	14		•		3			0.04
BELGIUM BULGARIA 1 321 0 4 111 111 1 0 8 2 1 0 0.10 0.1 CZECH REP		00	100			11		Ü			0.34
BULGARIA 1 321 0 4 11 11 11 1 3 0.22 0.22 0.25 0.25 0.25 0.25 0.25 0.25								2			
CZECH REP DENMARK ESTONIA FINLAND SINCHARD SENTINIA FINLAND SENTINIA SENT		1	321	0							
DEMARK SESTONIA FINLAND FINLAN		I	321	U							
ESTONIA FIRILAND FRANCE					4	10	0	3	3	0.26	0.30
FINLAND FRANCE GERMANY GERMA											
ERRANCE GERMANY GREECE 20 60 692 180 24 33 35 148 24 0.13 0.0 GREECE 20 180 24 33 35 148 24 0.13 0.0 GREECH HUNGARY 0 0 0 0 0 0 0 0 0.17 0.1 GRELAND 0 0 0 0 0 0 0 0 0.77 0.1 GRELAND 10 0 0 0 0 0 0 0 0.2 0.0 GREECH HUNGARY 0 0 0 0 0 0 0 0 0 0.2 0.0 GREECH HUNGARY 0 0 0 0 0 0 0 0 0 0.2 0.0 GREECH HUNGARY 0 0 0 0 0 0 0 0 0 0.2 0.0 GREECH HUNGARY 0 0 0 0 0 0 0 0 0 0.2 0.0 GREECH HUNGARY 0 0 0 0 0 0 0 0 0 0.2 0.0 GREECH HUNGARY 0 0 0 0 0 0 0 0 0 0.2 0.0 GREECH HUNGARY 0 0 0 0 0 0 0 0 0 0.2 0.0 GREECH HUNGARY 0 0 0 0 0 0 0 0 0 0.2 0.0 GREECH HUNGARY 0 0 0 0 0 0 0 0 0 0.2 0.0 GREECH HUNGARY 0 0 0 0 0 0 0 0 0 0.2 0.0 GREECH HUNGARY 1 3 3 1 0 0.38 0.55 GREECH HUNGARY POLAND POLAND POLAND POLAND POLAND 1 0 6 6 1 0 1.2 0.1 GREECH HUNGARY POLAND POLAND 1 1 2 2 1 1 0.27 0.2 GREECH HUNGARY FORWARY POLAND POLAND POLAND 1 1 2 2 1 1 0.27 0.2 GREECH HUNGARY 1 1 2 2 1 1 0.27 0.2 GREECH HUNGARY SELOVAK REP. SUPPLICATION WINGARY 1 1 3 3 0 0 0 0 0.2 0.0 GREECH HUNGARY 1 1 3 4 7 0.15 0.6 GREECH HUNGARY 1 1 1 3 4 7 0.15 0.6 GREECH HUNGARY 1 1 1 3 4 7 0.15 0.6 GREECH HUNGARY 1 1 1 3 4 7 0.15 0.6 GREECH HUNGARY 1 1 1 3 4 7 0.15 0.6 GREECH HUNGARY 1 1 1 3 4 7 0.15 0.6 GREECH HUNGARY 1 1 1 2 2 2 1 1 0.7 GREECH HUNGARY 1 1 1 3 4 7 0.15 0.6 GREECH HUNGARY 1 1 1 2 2 2 1 1 0.7 G						_	_				
GERMANY GREECE 260 692 180 24 3 35 148 24 0.13 0.06 HUNCARY RELAND RELAN											
GREECE 260 692 180 24 3 35 148 24 0.13 0.6											0.14
HUNGARY RELAND 0 2 2 2 0 0 0.11 0.17 RELY 10 54 50 4 9 0.16 0.17 RALY 10 54 50 4 9 0.16 0.17 RELEAND 10 70 0 0 0 0 0 0 0.56 0.56 RELEARD 10 8 1 3 3 1 0.38 RETHERIANDS 11 8 2 2 1 1 0.34 RELEARD 11 8 6 6 1 1 0.12 0.17 ROMANIA 11 2 2 2 1 1 0.27 RUSSIA 11 34 7 0.15 0.66 RWIDER 11 34 7 0.15 0.66 RWIDER 12 8 8 8 0 0.27 RUSSIA RUSSIA 13 8 5 2 0.17 RUSSIA RUSSIA 13 8 5 2 0.17 RUSSIA RUSSIA 13 8 5 2 0.17 RUSSIA 13 8 8 5 2.71 RUSSIA 13	GERMANY				6	37	32	6	6	0.15	0.18
RELAND TATALY 100 54 550 4 99 0.16 0.11 LATVIA 100 0 0 0 0 0 0 0 0.22 0.32 0.33 0.11 1 2 2 2 1 1 0.34 0.30 NORIUNAY SOLIAND 10 1 2 2 2 1 1 0.34 0.30 NORWAY SOLIAND 11 2 2 2 1 1 0.34 0.30 NORWAY SOLIAND 11 3 3 3 1 0.38 NORWAY SOLIAND 11 6 6 6 6 1 0.12 0.11 SOLIAND 11 6 6 6 34 34 6 6 0.18 0.17 SOLIAND 11 1 2 2 2 1 1 0.27 0.22 0.33 0.34 0.34 0.34 0.34 0.34 0.34 0.34	GREECE	260	692	180	24	3	35	148	24	0.13	0.69
TALY 10	HUNGARY				0	2	2		0	0.11	0.11
LATVIA LA	IRELAND				0	0	0		0	0.17	0.17
LITHUANIA	ITALY				10	54	50	4	9	0.16	0.18
LITHUANIA											0.32
MOLDOVA NETHERLANDS NORWAY POLAND PORTUGAL ROMANIA ROM											
NETHERIANDS NORWAY POLAND POLAND PORTUGAL 6 6 34 34 4 6 6 0.18 0.11 ROMANIA 1 1 2 2 2 1 1 0.27 0.2 RUSSIA ROMANIA 1 1 2 2 2 1 1 0.27 0.2 RUSSIA SWEDEN SWEDEN SWITZERLAND 0 3 3 3 0 0 0.12 0.1 UKRAINE 0 3 13 8 5 2 0.17 0.25 RUSKIA SWITZERLAND 0 3 3 3 0 0 0.12 0.1 UKRAINE 0 3 13 8 5 2 0.17 0.25 RUSKIA CHINGA CHI											
NORWAY POLAND POLAND POLAND 1 1 6 6 6 1 0.12 0.1: PORTUGAL 6 34 34 4 6 0.18 0.1: ROMANIA 1 1 2 2 1 1 0.27 0.2 RUSSIA SLOVAR REP. SPAIN SWEDEN SWEDEN SWEDEN SWITZERLAND 0 3 3 3 0 0 0.12 0.1: RURRING NORMANIA 1 1 2 2 2 1 0.25 ROMEN SWEDEN SWEDEN SWITZERLAND 0 3 3 3 0 0 0 0.12 0.1: ROMANIA 1 1 2 2 2 1 0.25 ROMEN ROMEN SWITZERLAND 0 3 3 3 0 0 0 0.12 0.1: ROMEN SWEDEN SWITZERLAND 0 2 8 8 8 2 2 0.25 ROMEN SWITZERLAND 0 2 8 8 8 2 2 0.25 ROMEN SWITZERLAND 0 2 8 8 8 2 2 0.25 ROMEN SWITZERLAND 0 2 8 8 8 2 2 0.25 ROMEN SWITZERLAND 0 2 8 8 8 2 2 0.25 ROMEN SWITZERLAND 0 2 8 8 8 2 2 0.25 ROMEN SWITZERLAND 0 2 8 8 8 2 2 0.25 ROMEN SWITZERLAND 0 1 1 1 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0							2	2			0.54
POLAND PORTUGAL					'	3		3		0.30	
PORTUGAL ROMANIA 1 2 2 2 1 0.27 0.2 RUSSIA SLOVAR REP. SPAIN 64 709 45 5 2 11 34 7 0.15 SWEDEN SWEDEN SWITZERLAND 0 3 3 3 0 0 0.12 0.1 UNITED KINGDOM FORMERY VGOSLAVIA FORMER					4	6	^		4	0.42	0.40
ROMANIA RUSSIA SLOVAK REP. SPAIN 64 709 45 5 2 11 34 7 0.15 0.6 SWEDEN SWITZERLAND UKRAINE ULKRAINE UL											
RUSSIA SLOVAK REP. SEANN 64 709 45 5 2 111 34 7 0.15 0.6 SWEDEN 0.23 0.0											
SLOVAK REP. SPAIN 64 709 45 5 2 111 34 7 0.15 0.6 SWEDEN SWITZERLAND 0 3 3 3 0 0 0 0.12 0.1: UKRAINE USTERLAND 0 3 13 8 5 2 0.17 0.2 UKRAINE USTERLAND 0 2 8 8 8 2 2 0.25 0.2 EUROPE FORMER YUGOSLAVIA EUROPE 1 2 8 8 8 2 2 0.25 0.2 EUROPE 1 1 2 369 406 213 112 0.13 0.2 EUROPE 1 1 2 0.1 112 0.13 0.2 EUROPE 1 1 2 0.1 112 0.1											0.27
SPAIN 64 709 45 5 2 11 34 7 0.15 0.6 SWEDEN 0.23 0.23 0.23 0.23 0.24 0.25 0.25 0.25 0.25 0.25 0.25 0.25 0.25	RUSSIA				44	135	142		38	0.27	0.27
SWEDEN SWITZERLAND URRAINE USTERLAND USTERLAND USTERLAND URRAINE USTERLAND UST	SLOVAK REP.										
SWITZERLAND UNITED KINGDOM FORMER YUGOSLAVIA UNITED KINGDOM FORMER YUGOSLAVIA EUROPE 356 674 240 122 369 406 219 205 66 196 219 205 64 0.15 0.22 0.27 0.22 0.22 0.25 0.22 0.25 0.22 0.25 0.26 0.20 0.21 0.21 0.21 0.21 0.21 0.22 0.22	SPAIN	64	709	45	5	2	11	34	7	0.15	0.64
UKRAINE UNITED KINGDOM FORMER YUGOSLAVIA 2 8 8 8 2 0.25 0.25 0.25 0.25 0.25 0.25 0.25 0.	SWEDEN									0.23	
UKRAINE UNITED KINGDOM FORMER YUGOSLAVIA 2 8 8 8 2 0.25 0.25 0.25 0.25 0.25 0.25 0.25 0.					0	3	3	0	0		0.13
UNITED KINGDOM FORMER YUGOSLAVIA Europe 356 674 240 122 369 406 213 112 0.13 0.2 CHINA 5,337 1,199 6,400 2,937 3,200 9,818 5 2,714 0,28 0.2 CHINA 5,337 1,199 6,400 2,937 3,200 9,818 5 2,714 0,28 0,2 TAILWAN 60 188 194 55 0,29 0,2 T1 13 60 18 0,24 1,3 Sub total 5,337 1,199 6,400 3,017 3,459 10,024 65 2,787 0,28 0,2 AUSTRALIA 557 1,575 877 115 0 9 565 418 0,73 47.4 NDDONESIA 9 707 6 104 455 461 4 100 0,21 0,2 APAN 27 59 64 0,3 AUSTRALIA NOREA, DR. 11 534 6 4 6 4 6 7 5 5 11 4 0,40 0,44 KOREA, REP. 43 219 220 41 10 10 10 10 10 10 10 10 10 10 10 10 10											
FORMER YUGOSLAVIA Europe 356 674 240 122 369 406 213 112 0.13 0.22 Including EU-27 324 695 225 66 196 219 205 64 0.15 0.22 Including EU-27 324 695 225 66 196 219 205 64 0.15 0.22 CHINA 5,337 1,199 6,400 2,937 3,200 9,818 5 2,714 0.28 0.2 CHINA 5,337 1,199 6,400 3,017 3,459 10,024 65 2,787 0.28 0.2 AUSTRALIA 55,337 1,199 6,400 3,017 3,459 10,024 65 2,787 0.28 0.2 AUSTRALIA 5567 1,575 877 115 0 9 5665 418 0.73 47.4 INDONESIA 9 707 6 104 455 461 4 100 0.21 0.2 JAPAN 27 59 64 23 0.36 0.3 KOREA, D.R. 11 534 6 4 5 11 4 4 0.40 0.4 KOREA, REP. 43 219 220 41 0.19 0.1 MALAYSIA 560 0 0 2 14 15 2 2 0.17 0.1 SINGAPORE 1 1 3 3 3 1 0.24 INDIANSIAN 9 459 4 73 363 362 78 0.22 VIETNAM 9 459 4 73 363 362 78 0.22 VIETNAM 9 459 4 73 363 362 78 0.22 VIETNAM 9 459 4 73 363 362 78 0.22 VIETNAM 9 459 4 73 363 362 78 0.22 VIETNAM 9 459 4 73 363 362 78 0.22 VIETNAM 9 459 4 73 363 362 78 0.22 VIETNAM 9 459 4 73 363 362 78 0.22 VIETNAM 11,000 520 5,720 1,445 91 4,560 1,011 1,685 0.30 0.3 WANNAMAR 310 210 65 34 11 162 772 778 164 0.35 0.4 AFGHANISTAN 50 410 20 29 4 2 5 1,01 1,685 0.30 0.3 WANNAMAR 310 210 65 34 11 162 772 778 1 167 0.21 0.2 SASIB 13,995 546 7,647 2,144 1,236 7,594 1,083 2,351 0.27 0.3 IRAN 100 676 68 35 72 140 35 0.22 0.2 SASIB 13,995 546 7,647 2,144 1,236 7,594 1,083 2,351 0.27 0.3 IRAN 100 676 68 35 72 140 35 0.20 0.2 SYRIA 199 1,240 246 81 51 51 51 57 764 1.08 0.00 SYRIA 199 1,240 246 81 51 185 61 81 0.33 0.4 TURKEY 380 1,310 498 363 700 1,250 10 291 0.23 0.25 SUB total 737 1,143 842 490 807 1,527 84 417 0.28 0.25					O .	10	J	0	_		0.20
Europe Including EU-27 324 695 225 66 196 219 205 64 0.15 0.2 Chinna 5,337 1,199 6,400 2,937 3,200 9,818 5 2,714 0.28 0.2 TAIWAN					2	0	0		2		0.25
Including EU-27 324 695 225 66 196 219 205 64 0.15 0.2		250	674	040				040			
CHINA 5,337 1,199 6,400 2,937 3,200 9,818 5 2,714 0,28 0,22 TAIWAN 60 188 194 555 0,29 0,22 HONG KONG 20 71 13 60 18 0,24 1,3 Sub total 5,337 1,199 6,400 3,017 3,459 10,024 65 2,787 0,28 0,22 AUSTRALIA 557 1,575 877 115 0 9 565 418 0,73 47.4 INDONESIA 9 707 6 104 455 461 4 100 0,21 0,2 JAPAN 27 59 64 23 0,36 0,3 KORDEA, DR. 11 534 6 4 5 11 4 10 0,21 0,2 JAPAN 27 59 64 23 0,36 0,3 KORDEA, DR. 11 534 6 4 5 11 4 10 0,021 0,2 JAPAN 4 5 11 4 4 0,40 0,40 0,40 0,40 0,40 0,40 0,	-										
TAIWAN HONG KONG Sub total 5,337 1,199 6,400 3,017 3,459 10,024 65 2,787 0,28 0,24 1,3 AUSTRALIA 557 1,575 877 115 0 9 566 104 455 461 4 100 0,21 0,21 0,21 0,22 0,366 0,30 KOREA, D.R. 11 534 6 4 3 219 220 41 100 0,20 0,20 0,21 0,20 0,30 HILIPPINES 0 560 0 10 52 52 10 0,20 0,20 0,21 0,20 0,21 0,20 0,21 0,20 0,21 0,20 0,	including EU-27	324	695	225	66	196	219	205	64	0.15	0.29
HONG KONG Sub total 5,337 1,199 6,400 3,017 3,459 10,024 65 2,787 0,28 0,2 AUSTRALIA MIDONESIA 9 707 6 104 455 461 4 100 0,21 0,2 JAPAN KOREA, D.R. 11 534 6 4 4 5 10 5 10 5 6 10 4 5 10 10 10 10 10 10 10 10 10	CHINA	5,337	1,199	6,400	2,937	3,200	9,818	5	2,714	0.28	0.28
HONG KONG Sub total 5,337 1,199 6,400 3,017 3,459 10,024 65 2,787 0,28 0,2 AUSTRALIA MIDONESIA 9 707 6 104 455 461 4 100 0,21 0,2 JAPAN KOREA, D.R. 11 534 6 4 4 5 10 5 10 5 6 10 4 5 10 10 10 10 10 10 10 10 10	TAIWAN				60	188	194		55	0.29	0.29
Sub total S,337								60			1.37
AUSTRALIA 557 1,575 877 115 0 9 565 418 0.73 47.4; INDONESIA 9 707 6 104 455 461 4 100 0.21 0.2; JAPAN 27 59 64 23 0.36 0.3; KARLANKA 2 S. Asia 13,995 546 7,647 2,144 1,236 7,594 1,083 2,351 0.27 0.3; SIRAN 100 676 68 35 72 140 35 0.25 0.2; SIRAN 100 676 68 36 7 2 1,240 125 140 35 0.25 0.2; SIRAN 100 676 68 36 7 2 140 35 0.25 0.2; SIRAN 100 676 68 36 7 2 144 1,236 7,594 1,083 2,351 0.27 0.3; SIRIA 199 1,240 246 81 185 61 81 0.33 0.4; CIRKEY 380 1,310 448 363 700 1,255 10 291 0.29 1.28; SIRIA 199 1,240 246 81 185 61 81 0.33 0.4; CIRKEY 380 1,310 448 363 700 1,255 10 291 0.29 1.29; CIRKEY 380 1,310 448 363 700 1,255 10 291 0.29; CIRKEY 380 1,310 448 363 700 1,255 10 291 0.29; CIRKEY 380 1,310 498 363 700 1,255 10 291 0.29; CIRKEY 380 1,310 498 363 700 1,255 10 291 0.29; CIRKEY 380 1,310 498 363 700 1,255 10 291 0.29; CIRKEY 380 1,310 498 363 700 1,255 10 291 0.29; CIRKEY 380 1,310 498 363 700 1,255 10 291 0.29; CIRKEY 380 1,310 498 363 700 1,255 10 291 0.29; CIRKEY 380 1,310 498 363 700 1,255 10 291 0.29; CIRKEY 380 1,310 498 363 700 1,255 10 291 0.29; CIRKEY 380 1,310 498 363 700 1,255 10 291 0.29; CIRKEY 380 1,310 498 363 700 1,255 10 291 0.23; CIRKEY 380 1,310 498 363 700 1,255 10 291 0.23; CIRKEY 380 1,310 498 363 700 1,255 10 291 0.23; CIRKEY 380 1,310 498 363 700 1,255 10 291 0.23; CIRKEY 380 1,310 498 363 700 1,255 10 291 0.23; CIRKEY 380 1,310 498 363 700 1,255 10 291 0.23; CIRKEY 380 1,310 498 363 700 1,255 10 291 0.23; CIRKEY 380 1,310 498 363 700 1,255 10 291 0.23; CIRKEY 380 1,310 498 363 700 1,255 10 291 0.23; CIRKEY 380 1,310 498 363 700 1,255 10 291 0.23; CIRKEY 380 1,310 498 363 700 1,255 10 291 0.23; CIRKEY 380 1,310 498 363 700 1,255 10 291 0.23; CIRKEY 380 1,310 498 363 700 1,255 10 291 0.23; CIRKEY 380 1,310 498 363 700 1,255 10 291 0.23; CIRKEY 380 1,310 498 363 700 1,255 10 291 0.23; CIRKEY 380 1,310 498 363 700 1,255 10 291 0.23; CIRKEY 380 1,310 498 363 700 1,255 10 291 0.23; CIRKEY 380 1,310 498 363 700 1,255 10 291 0.23; CIRKEY 380 1,310 498 363 700 1,255 10 291 0.23; CIRKEY 380 1,310 49		5 337	1 199	6 400							
INDONESIA 9 707 6 104 455 461 4 100 0.21 0.21 0.21 JAPAN CREA, D.R. 11 534 6 4 5 11 4 0.40 0.44 0.64 0.64 0.62 0.62 0.62 0.62 0.62 0.62 0.62 0.62	oub total	0,007	1,100	0,400	0,011	0,400	10,024	•	2,707	0.20	0.20
JAPAN KOREA, D.R. 11 534 6 4 5 11 4 0.40 0.4 KOREA, REP. MALAYSIA MALAYSIA DITION 52 52 52 10 0.20 0.2 DITION 52 52 52 0.20 0.7 DITION 52 57 57 56 0.20 0.2 DITION 52 57 57 56 0.20 0.20 0.20 0.20 0.20 0.20 0.20 0.2	AUSTRALIA	557	1,575	877	115		9	565	418	0.73	47.42
JAPAN KOREA, D.R. 11 534 6 4 5 11 4 0.40 0.4 KOREA, REP. MALAYSIA MALAYSIA DITION 52 52 52 10 0.20 0.2 DITION 52 52 52 0.20 0.7 DITION 52 57 57 56 0.20 0.2 DITION 52 57 57 56 0.20 0.20 0.20 0.20 0.20 0.20 0.20 0.2	INDONESIA	9	707	6	104	455	461	4	100	0.21	0.22
KOREA, D.R. 11 534 6 4 5 11 4 0.40 0.46 KOREA, REP. 43 219 220 41 0.19 0.11 MALAYSIA 10 52 52 10 0.20 0.21 PHILIPPINES 0 560 0 2 14 15 2 0.21 SINGAPORE 1 1 3 3 3 1 0.24 THAILAND 2 511 1 85 380 378 4 84 0.22 0.22 VIETNAM 9 459 4 73 363 362 78 0.22 0.22 VIETNAM 4 59 459 4 73 363 362 78 0.22 0.22 VIETNAM 50 410 20 29 4 4 25 20 0.70 4.8 BANGLADESH 32 348 11 162 772 778 167 0.21 0.2 INDIA 11,000 520 5,720 1,445 91 4,560 1,011 1,685 0.30 0.3 MYANMAR 310 210 65 34 4 4 7 18 34 0.52 0.7 PAKISTAN 2,600 703 1,829 473 370 2,200 29 443 0.20 0.22 SRI LANKA 0 2 2 2 0 0.22 0.22 SRI LANKA 0 2 2 2 0 0.22 0.22 SRI LANKA 100 676 68 35 72 140 35 0.25 S. Asia 13,995 546 7,647 2,144 1,236 7,594 1,083 2,351 0.27 0.3 IRAN 100 676 68 35 72 140 35 0.25 S. Asia 199 1,240 246 81 185 61 81 0.33 0.4 TURKEY 380 1,310 498 363 700 1,250 10 291 0.23 Sub total 737 1,143 842 490 807 1,627 84 417 0.28 0.21	JAPAN				27				23		0.36
KOREA, REP. MALAYSIA MALAYSIA 10 52 52 10 0.20 0.21 PHILIPPINES 0 560 0 2 14 15 2 2 0.17 0.1° SINGAPORE 1 3 3 3 1 0.24 THAILAND 2 511 1 85 380 378 4 84 0.22 0.2 E. Asia 597 1,510 902 466 1,551 1,578 577 764 0.35 BANGLADESH 32 348 11 162 772 778 167 0.21 0.2 INDIA 11,000 520 5,720 1,445 91 4,560 1,011 1,685 0.30 0.3 MYANMAR 310 210 65 34 473 370 2,200 29 443 0.52 0.7 SRI LANKA 5 0 764 0.55 0.7 SRI LANKA 5 0 765 7,647 2,144 1,236 7,594 1,083 2,351 0.27 0.3 IRAN 100 676 68 35 72 140 35 0.25 0.25 IRAQ 20 356 7 1 5 15 13 1 10.09 0.00 IRAQ 100 676 68 35 72 140 35 0.25 0.25 IRAQ 20 356 7 1 5 15 13 1 0.09 0.00 IRAQ 20 356 7 1 5 15 13 1 0.09 0.00 IRAQ 20 356 7 2 140 35 0.25 0.25 IRAQ 20 356 7 2 140 35 0.25 0.25 IRAQ 30 30 1,310 498 363 700 1,250 10 291 0.23 0.2 SUB total 737 1,143 842 490 807 1,627 84 417 0.28 0.2 Sub total 737 1,143 842 490 807 1,627 84 417 0.28 0.2		11	534	6							0.40
MALAYSIA PHILIPPINES		• • • • • • • • • • • • • • • • • • • •	001	Ü							
PHILIPPINES 0 560 0 2 14 15 2 0.17 0.1 SINGAPORE 1 3 3 3 1 0.24 1											
SINGAPORE THAILAND 2 511 1 85 380 378 4 84 0.22 0.2: VIETNAM 9 459 4 73 363 362 78 0.22 0.2: E. Asia 597 1,510 902 466 1,551 1,578 577 764 0.35 0.4: AFGHANISTAN BANGLADESH 32 348 11 162 772 778 167 0.21 0.2 INDIA I1,000 520 5,720 1,445 91 4,560 1,011 1,685 0.30 0.3 MYANMAR 310 210 65 34 47 18 34 0.52 0.7: PAKISTAN 2,600 703 1,829 473 370 2,200 29 443 0.20 0.2: SRI LANKA 0 2 2 2 0 0.22 S. Asia 13,995 546 7,647 2,144 1,236 7,594 1,083 2,351 0.27 0.3 IRAN 1RAN 100 676 68 35 72 140 35 0.25 0.2: IRAQ 0 2 0 356 7 1 5 13 1 0.09 0.0: IRAN 1RAN 199 1,240 246 81 185 61 81 0.33 0.4 TURKEY 380 1,310 498 363 700 1,250 10 291 0.23 0.2: Sub total 737 1,143 842 490 807 1,627 84 417 0.28 0.2		0	E60	0							
THAILAND 2 511 1 85 380 378 4 84 0.22 0.2 VIETNAM 9 459 4 73 363 362 78 0.22 0.2 E. Asia 597 1,510 902 466 1,551 1,578 577 764 0.35 0.4 AFGHANISTAN 50 410 20 29 4 25 20 0.70 4.8 BANGLADESH 32 348 11 162 772 778 167 0.21 0.2 INDIA 11,000 520 5,720 1,445 91 4,560 1,011 1,685 0.30 0.3 MYANMAR 310 210 65 34 47 18 34 0.52 0.7 PAKISTAN 2,600 703 1,829 473 370 2,200 29 443 0.20 0.2 SRI LANKA 0 2 2 2 0 0.22 SRI LANKA 0 2 2 2 0 0.22 SRI LANKA 0 2 2 2 0 0.22 SRI LANKA 0 0 2 2 2 0 0.22 SRI LANKA 0 0 2 2 7 0 0.22 SRI LANKA 0 0 0.23 SRI LANKA 0 0 0 0.24 SRI LANKA 0 0 0 0.25 SRI LANKA 0		U	900	U			15	2			0.17
VIETNAM 9 459 4 73 363 362 78 0.22 0.22 E. Asia 597 1,510 902 466 1,551 1,578 577 764 0.35 0.4 AFGHANISTAN 50 410 20 29 4 25 20 0.70 4.8 BANGLADESH 32 348 11 162 772 778 167 0.21 0.2 INDIA 11,000 520 5,720 1,445 91 4,560 1,011 1,685 0.30 0.3 MYANMAR 310 210 65 34 47 18 34 0.52 0.7 PAKISTAN 2,600 703 1,829 473 370 2,200 29 443 0.20 0.2 SRI LANKA 0 2 2 0 0.22 0.2 0 0.22 0.2 S. Asia 100 676 68 <t< td=""><td></td><td>•</td><td>-11</td><td></td><td></td><td></td><td>070</td><td></td><td></td><td></td><td>0.00</td></t<>		•	-11				070				0.00
E. Asia 597 1,510 902 466 1,551 1,578 577 764 0.35 0.4 AFGHANISTAN 50 410 20 29								4			
AFGHANISTAN 50 410 20 29 4 25 20 0.70 4.8 BANGLADESH 32 348 11 162 772 778 167 0.21 0.2 10.2 11.0 11.0 11.0 11.0 11.0	VIETNAM										0.22
BANGLADESH 32 348 11 162 772 778 167 0.21 0.2 INDIA 11,000 520 5,720 1,445 91 4,560 1,011 1,685 0.30 0.3 MYANMAR 310 210 65 34 47 18 34 0.52 0.7 PAKISTAN 2,600 703 1,829 473 370 2,200 29 443 0.20 0.22 SRI LANKA 0 2 2 0 0.22 0.2 S. Asia 13,995 546 7,647 2,144 1,236 7,594 1,083 2,351 0.27 0.3 IRAN 100 676 68 35 72 140 35 0.25 0.2 IRAQ 20 356 7 1 5 13 1 0.09 0.0 ISRAEL 4 1,860 7 2 7 1 0.18 SYRIA 199 1,240 246 81 185 61 <td< td=""><td>E. Asia</td><td>597</td><td>1,510</td><td>902</td><td>466</td><td>1,551</td><td>1,578</td><td>577</td><td>764</td><td>0.35</td><td>0.48</td></td<>	E. Asia	597	1,510	902	466	1,551	1,578	577	764	0.35	0.48
BANGLADESH 32 348 11 162 772 778 167 0.21 0.2 INDIA 11,000 520 5,720 1,445 91 4,560 1,011 1,685 0.30 0.3 MYANMAR 310 210 65 34 47 18 34 0.52 0.7 PAKISTAN 2,600 703 1,829 473 370 2,200 29 443 0.20 0.22 SRI LANKA 0 2 2 0 0.22 0.2 S. Asia 13,995 546 7,647 2,144 1,236 7,594 1,083 2,351 0.27 0.3 IRAN 100 676 68 35 72 140 35 0.25 0.2 IRAQ 20 356 7 1 5 13 1 0.09 0.0 ISRAEL 4 1,860 7 2 7 1 0.18 SYRIA 199 1,240 246 81 185 61 <td< td=""><td>AFGHANISTAN</td><td>50</td><td>410</td><td>20</td><td>29</td><td></td><td>4</td><td>25</td><td>20</td><td>0.70</td><td>4.87</td></td<>	AFGHANISTAN	50	410	20	29		4	25	20	0.70	4.87
INDIA						779		20			
MYANMAR 310 210 65 34 47 18 34 0.52 0.72 PAKISTAN 2,600 703 1,829 473 370 2,200 29 443 0.20 0.22 SRI LANKA 0 2 2 0 0.22 0.2 S. Asia 13,995 546 7,647 2,144 1,236 7,594 1,083 2,351 0.27 0.3 IRAN 100 676 68 35 72 140 35 0.25 0.2 IRAQ 20 356 7 1 5 13 1 0.09 0.09 ISRAEL 4 1,860 7 2 7 1 0.18 YRIA 199 1,240 246 81 185 61 81 0.33 0.4 TURKEY 380 1,310 498 363 700 1,250 10 291 0.23 0.23 <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td> <td>1 011</td> <td></td> <td></td> <td></td>								1 011			
PAKISTAN 2,600 703 1,829 473 370 2,200 29 443 0.20 0.20 SRI LANKA SRI LANKA 13,995 546 7,647 2,144 1,236 7,594 1,083 2,351 0.27 0.3 IRAN 100 676 68 35 72 140 35 0.25 0.25 IRAQ 20 356 7 1 5 13 1 0.09 0.00 ISRAEL 4 1,860 7 2 7 1 0.18 SYRIA 199 1,240 246 81 185 61 81 0.33 0.4 TURKEY 380 1,310 498 363 700 1,250 10 291 0.23 0.25 Sub total 737 1,143 842 490 807 1,627 84 417 0.28 0.20						91					
SRI LANKA 0 2 2 2 0 0.22 0.22 S. Asia 13,995 546 7,647 2,144 1,236 7,594 1,083 2,351 0.27 0.3 IRAN 100 676 68 35 72 140 35 0.25 0.2 IRAQ 20 356 7 1 5 13 1 0.09 0.0 ISRAEL 4 1,860 7 2 7 1 0.18 SYRIA 199 1,240 246 81 185 61 81 0.33 0.4 TURKEY 380 1,310 498 363 700 1,250 10 291 0.23 0.2 Sub total 737 1,143 842 490 807 1,627 84 417 0.28 0.2						070					
S. Asia 13,995 546 7,647 2,144 1,236 7,594 1,083 2,351 0.27 0.3 IRAN 100 676 68 35 72 140 35 0.25 0.2 IRAQ 20 356 7 1 5 13 1 0.09 0.0 ISRAEL 4 1,860 7 2 7 1 0.18 5 SYRIA 199 1,240 246 81 185 61 81 0.33 0.4 TURKEY 380 1,310 498 363 700 1,250 10 291 0.23 0.2 Sub total 737 1,143 842 490 807 1,627 84 417 0.28 0.2		2,600	703	1,829				29			
IRAN 100 676 68 35 72 140 35 0.25 0.26 IRAQ 20 356 7 1 5 13 1 0.09 0.05 ISRAEL 4 1,860 7 2 7 1 0.18 SYRIA 199 1,240 246 81 185 61 81 0.33 0.45 TURKEY 380 1,310 498 363 700 1,250 10 291 0.23 0.25 Sub total 737 1,143 842 490 807 1,627 84 417 0.28 0.25											0.22
IRAQ 20 356 7 1 5 13 1 0.09 0.00 ISRAEL 4 1,860 7 2 7 1 0.18 SYRIA 199 1,240 246 81 185 61 81 0.33 0.4- TURKEY 380 1,310 498 363 700 1,250 10 291 0.23 0.25 Sub total 737 1,143 842 490 807 1,627 84 417 0.28 0.20	S. Asia	13,995	546	7,647	2,144	1,236	7,594	1,083	2,351	0.27	0.31
IRAQ 20 356 7 1 5 13 1 0.09 0.00 ISRAEL 4 1,860 7 2 7 1 0.18 SYRIA 199 1,240 246 81 185 61 81 0.33 0.4- TURKEY 380 1,310 498 363 700 1,250 10 291 0.23 0.25 Sub total 737 1,143 842 490 807 1,627 84 417 0.28 0.20	IRAN	100	676	68	35	72	140		35	0.25	0.25
ISRAEL 4 1,860 7 2 7 1 0.18 SYRIA 199 1,240 246 81 185 61 81 0.33 0.4 TURKEY 380 1,310 498 363 700 1,250 10 291 0.23 0.2 Sub total 737 1,143 842 490 807 1,627 84 417 0.28 0.2											0.09
SYRIA 199 1,240 246 81 185 61 81 0.33 0.4 TURKEY 380 1,310 498 363 700 1,250 10 291 0.23 0.2 Sub total 737 1,143 842 490 807 1,627 84 417 0.28 0.2						3	13	7			0.00
TURKEY 380 1,310 498 363 700 1,250 10 291 0.23 0.20 Sub total 737 1,143 842 490 807 1,627 84 417 0.28 0.20							105				0.44
Sub total 737 1,143 842 490 807 1,627 84 417 0.28 0.20						700					
VORLD TOTAL 33,529 747 25,055 8,867 8,247 24,703 8,247 9,209 0.37 0.3	oup total	/3/	1,143	842	490	807	1,627	84	417	0.28	0.26
	WORLD TOTAL	33,529	747	25,055	8,867	8,247	24,703	8,247	9,209	0.37	0.37

^{*/} Ending stocks divided by consumption plus exports.

Subtotals and total include countries not shown.

^{**/} Ending stocks divided by consumption.

the extreme cotton shortages that characterize the 2010/11 marketing year. USDA's primary method of estimating annual stocks by aggregating 2010/11 supply-demand balance sheets for individual countries, while constructive, does not provide the "flow" information needed to determine whether stocks will be adequate in the early months of 2011/12. Superficially, the consistency of results using the two methods suggests that, to avoid supply-induced disruption, ending stocks should not fall below the forecast level of approximately 9.3 million tons. However, these results are preliminary and dependent upon the validity of a number of estimates and assumptions.

The study makes the key assumption that 2010/11 ending stocks will not fall to levels that will "short the market" in early 2011/12; however, given the current tightness, it is entirely possible that mills will respond by slowing operations as supplies tighten and use less cotton during August-October. Indeed, the recent rise in world prices to record levels may indicate that an atypical slowdown in consumption is likely. In connection with this, the study does not address seasonality in world consumption, which could also affect the supplies needed during the critical early fall months.

A further assumption which requires additional analysis is the premise that 2.2 million tons of pipeline stocks are needed at the October 31 low point. Since increasing quantities of new-crop supplies will be delivered in November, these may offset the pipeline requirements from stocks, reducing the minimum needed on July 31. Other developments, including weather factors, the timing of harvest, and the pace of transportation and delivery, are difficult to project at this juncture, but may affect stock-holding.

Finally, the study assumes that, given strong demand and high prices, world supplies will be delivered to the point of consumption efficiently, based on historical average or somewhat accelerated delivery schedules. Some factors which could interfere with delivery and raise the demand for stocks by mills include: (1) withholding of cotton from the market by producers; (2) government policies which encourage stockholding above the levels needed to support demand; and (3) a mismatch of available qualities with mill requirements.



THE STRUCTURE OF WORLD COTTON TRADE

By Andrei Guitchounts, ICAC

The structure of world cotton trade has been changing because of the financial stress experienced by many cotton merchants and cooperatives as a result of extreme volatility in the cotton futures market in March 2008, reduced hedging capacities, the credit crisis causing banks to tighten lending to traders and the economic recession that curbed demand for cotton. Many merchants incurred substantial losses, and several major cotton firms were forced into bankruptcy, merger or to go out of business. Market concentration increased and multicommodity trading houses with wider access to resources became more prominent.

Allenberg Cotton Company, the world's largest cotton merchant, acquired most of the Dunavant Enterprises' subsidiaries in 2010, which was one of the largest family owned cotton merchants. French Geocoton acquired the former Dunavant subsidiaries in Zambia, Uganda and Australia. Allenberg is owned by Louis Dreyfus Commodities, one of world's largest commodity traders with an estimated \$35 billion in annual revenue and valued at \$10 billion. Allenberg cotton was founded in 1921 and was acquired by Louis Dreyfus in 1983. Allenberg has offices across the cotton belt in the U.S and offices in many other countries. China, Asia and the Western Hemisphere are the major areas where Allenberg's operations have been expanding.

Dunavant was founded in 1929 and was one of the largest privately owned cotton-merchandising companies in the world. Dunavant was involved in ginning and warehousing. Dunavant exited the cotton merchant business in 2010 and will focus on global logistics and investments.

It was confirmed in September 2010 that Louis Dreyfus entered merger talks with Olam International, a Singaporebased company and one of the world's largest commodity and cotton traders. Olam International was founded in Singapore in 1989 as a large spinner/merchant. Olam is engaged in ginning, warehousing and merchandizing of cotton from Central Asia, West and East Africa, Americas and China. Olam acquired Queensland Cotton Corporation of Australia in 2007. Olam completed several acquisitions and investments in many commodities including rice, sugar, grains, coffee, cocoa, cashew, peanuts, beans, dairy, wool and others. Olam's revenues are estimated at \$10 billion, and the company is valued at \$5 billion. The merger, if completed, could create a \$15 billion commodity trader. It is evident that consolidation in the agricultural commodities sector is accelerating as the largest traders expand across commodities to take advantage of booming demand generated by population and income growth in fast growing emerging economies.

Cargill Cotton is one of the largest cotton merchants and is a subsidiary Cargill, one of the largest producers and traders of food, agricultural, financial and industrial products and services. Cargill does business in grains, oilseeds, sugar, meats, poultry, fuels and other commodities. Cargill revenues are estimated at \$108 billion. Cargill Cotton operates in all major cotton markets in merchandising, ginning and warehousing.

Over the past several years the number of major companies engaged in cotton trade declined, leading to higher concentration. The departed companies were mostly monocommodity, family-owned and operated businesses. At the same time, the role of large, multi-commodity trading houses has become more prominent in cotton trading. However, the 2010 study indicates that, based on numbers of companies operating and volumes of cotton traded, the cotton shipping industry still remains highly competitive.

The Secretariat has studied the structure of world trade in cotton since 1994 and compiles a list of cotton-trading companies active as of the end of each year. Most of the firms are members of the 18 associations comprising the Committee for International Cooperation between Cotton Associations (CICCA). The latest list was compiled from annual surveys mailed to all members of CICCA, from industry publications and personal knowledge. The total number of responding companies from the ten surveys is 107. The list of cotton trading companies consists of 450 firms engaged, at least in part, in international trade in cotton. Companies are divided into four categories by relative size. Organizations are also grouped by type of ownership: government, cooperative or private. The latest list of cotton trading organizations consists of 24 government organizations, 9 cooperatives and 417 private firms.

Largest

The most recent estimates of the volume traded by the largest companies in 2010 indicates that there are currently 12 companies with annual volumes of more than 200,000 tons. The group of largest companies includes 4 government organizations. The largest group traded an estimated 6.9 million tons, or 32% of world production in 2010. 8 privately owned largest cotton trading organizations handled 5.8 million tons in 2010, or 26% of world production. In 2009, there were 13 companies in the largest category, handling 6.2 million tons, or 27% of world production, including 9 private companies handling 5.2 million tons, or 22% of world production. In 2010, four of the world's largest cotton trading companies are based in the USA, three in Uzbekistan, all under the Ministry of Foreign Economic Relations Investment and Trade (MFERIT), and one each in Japan, China, Singapore, Switzerland and the UK. Uzprommashimpeks, one of the three government agencies from Uzbekistan was added to the list of firms reported by the ICA (International Cotton Association) to have failed to fulfill awards resulting from arbitrations conducted by CICCA member associations in December 2008.

The first study conducted in 1994 indicated that the 19 largest cotton organizations handled 6.8 million tons, or 36% of world production. 14 of the largest organizations were private or cooperative cotton companies, accounting for an estimated 5.5 million tons, or 29% of world cotton production. The conclusions of the study were that the world cotton industry was not highly concentrated by the standards of industrial

markets and that the international cotton shipping industry was highly competitive. Since 1994, the composition of the group of the largest cotton trading organizations has changed.

As a sign of market concentration, a smaller number of the largest firms handle a larger combined volume than in 1994. The largest companies handled record volumes in 2006/07, as a result of record production.

Large

A significant reduction in the number of merchants took place in the group of large companies (annual volume: 50,000 tons to 200,000 tons) during the past two years. It is estimated that the number of large companies declined from 44 merchants active in 2008 to 37 merchants trading cotton in 2010. The volume handled by the current group of large companies declined sharply from 4.4 million tons in 2008 to an estimated at 3.3 million tons in 2010, accounting for 15% of world production (17% in 2008). Compared with 2007, the volume traded by large companies in 2010 declined by 1.5 million tons. The composition of organizations defined as large companies has changed the most since 1994. The number of large government organizations declined from 15 to 3 as a result of privatization, mostly in Africa. The 1994 study indicated that there were 51 large cotton-trading companies handling 4.1 million tons, including 35 non-government owned large organizations accounting for 2.5 million tons, or 13% of world production. As of 2010, 32 private large companies are accounting for 3 million tons, or 14% of world production. The 40 largest and large non-government cotton trading companies account for 40% of world production in 2010, compared with 42% handled by 49 firms in the same categories in 1994.

Thirteen of the 37 large cotton traders are based in the USA. Four large firms are based in India, three in Switzerland and two in the UK.

A commodity trader, Noble Resources Group, entered into the cotton trade recently, joining the group of large cotton traders. Noble Cotton is headquartered in Singapore with regional offices in India, USA, Brazil, China, Uzbekistan, Australia, Turkey and Cote d'Ivoire. Noble Cotton is expanding operations in China, India, Brazil, Uzbekistan, USA and West Africa.

Another entry into the group is the recent formation of the Dubai Cotton Centre (DCC) in Dubai, UAE for the purpose of establishing a trading infrastructure for facilitating exports of Uzbek cotton. The DCC is owned by the government organization, Dubai Multi Commodities Centre (DMCC), and is working to provide services to the cotton supply chain, including storage, handling, shipping and merchandizing.

Multigrain S.A. based in Sao Paulo, Brazil, a multicommodity trader, entered into cotton trade about three years ago and has grown in cotton volumes traded to the size of a large trader. The firm has an affiliate in the USA. The company was founded in 1999, and its largest volumes of operations are in grains and soybeans.

With increased production, mill use and exports in India, a number of Indian merchants became more active internationally, entering other markets, such as China, opening offices in other countries and trading a variety of growths directly to mills.

Medium

There are currently 47 firms in the medium category (annual volume: 20,000 tons to 50,000 tons), five more than in 2008, with an estimated volume of 1.2 million tons. The volume traded by medium sized companies has changed only slightly during the past year. The number of medium sized companies declined as a result of shifts between the groups of larger companies. In 1994, there were 50 medium companies with approximately the same combined volume. Among the 47 medium sized companies, 8 are based in the USA, 4 in Turkey and 3 in Switzerland.

Specialized

The most recent survey includes 353 firms in the category of specialized companies accounting for 1.7 million tons of combined volume in 2010, little changed over the past 10 years. A very large number of specialized cotton trading companies are based in the USA, Turkey, Poland, India, Switzerland, Germany, Egypt, Brazil and Italy. Several European companies went out of business during this decade.

Banks and Ocean Freight Organizations

A list of banks and ocean freight organizations involved in providing services to the cotton industry was first compiled in 2003 as an attempt to list most of the service organizations involved in cotton trade. The list was expanded during the following years and now includes 42 banks from 12 countries and 40 shipping and freight forwarding organizations from 17 countries.

Banks provide important services to cotton trade, including finance, cash management, letter of credit issuance and collection and processing of documents, lending, bill collection, freight financing, foreign exchange, price risk management instruments, bonds and guaranties, inventory financing, tolling and barter trade financing, clearing, custodian and other services. Banks provide local, urban transaction banking infrastructure for large and small producers as well as services to international merchants financing international transactions. There are banks specializing in certain markets and there are international banking institutions providing a wide range of banking services globally.

Insurance Companies

During the past several years a first list of insurance companies providing services to the cotton industry was compiled. The list contains 16 insurance companies from 8 countries, many with a global presence and affiliated with banking services.

There is a large number of brokers who provide insurance services to the cotton industry on standard terms, such as the American Institute Cargo Clause or of the Lloyds of London clauses, but also could offer special coverage above and beyond standard clauses in unique situations. Among insurance companies specializing in providing full service in marine cargo insurance to cotton shippers are Rekerdres & Sons Insurance Agency, Cotton Fire and Mar. Underwriters based in USA; Lampe + Schwartze KG, C. Wm Konig Gmbh, H. Kraft & Co., NHA Hamburger Assekuranz-Agentur Gmbh based in Germany; and Windsor Insurance Brokers Ltd. Based in the UK. There are also large financial/insurance providers with hundreds of offices in tens of countries with a wide range of products and services, including insurance products in demand by the cotton industry such as AXA, Zurich and AIG.

A full list of cotton trading companies, banking, ocean freight and insurance organizations with contact information can be obtained at www.icac.org

COTTON TRADING ORGANIZATIONS

(FIRMS ARRANGED BT SIZE, ESTIMATES MADE BT THE SECRET	ANIAI)	
	Country		Type

Largest Organizations (annual volume: more than 200,000 tons)

Company Name

Allenberg Cotton Co, Cordova 1/ USA Private Cargill Cotton, Cordova 2/ USA Private Olam International Ltd, Singapore 3/ **SINGAPORE** Private Paul Reinhart AG, Winterthur 4/ **SWITZERLAND** Private Staple Cotton Cooperative Association, Greenwood USA Cooperative CHINA (MAINLAND) Chinatex, Beijing, China Government Ecom USA Inc, Dallas 5/ USA Private Plexus Cotton Ltd, Liverpool 6/ UK Private Joint-Stock Company Uzinterimpex, Tashkent UZBEKISTAN Government State Joint Stock Foreign Trade Company "Uzmarkazimpex." Tashkent UZBEKISTAN Government Uzprommashimpeks, Tashkent **UZBEKISTAN** Government Toyo Cotton (Japan) Co, Osaka 7/ JAPAN Private

Large Organizations (annual volume: 50,000 tons to 200,000 tons)

Cargill Cotton, Liverpool 2/ UK Private Anderson Clayton Corp, Fresno 3/ USA Private Ecom Agroindustrial Corp Ltd. Pully 5/ **SWITZERLAND** Private The Cotton Corporation of India Ltd, Mumbai **INDIA** Government C.A. Galiakotwala & Co Ltd, Mumbai **INDIA** Private Gill & Co Ltd, Mumbai **INDIA** Private Kotak & Co Pvt Ltd, Mumbai **INDIA** Private Noble Resources Group, Singapore **SINGAPORE** Private Toyoshima & Co Ltd, Nagoya 9/ **JAPAN** Private Agro Industrias Unidas De Mexico SA De Cv Amsa, Mexico City 5/ **MEXICO** Private Calcot Ltd, Bakersfield USA Cooperative Jess Smith & Sons Cotton, Llc, Bakersfield USA Private Multigrain SA, Sao Paulo **BRAZIL** Private Plains Cotton Cooperative Association, Lubbock USA Cooperative Tovo Cotton Co. Dallas 7/ USA Private Devcot SA, Lille **FRANCE** Private Otto Stadtlander Gmbh, Bremen **GERMANY** Private Toyoshima USA, Inc, Cordova 9/ USA Private EISA - Empresa Ineragricola S.A, São Paulo 5/ **BRAZIL** Private Texas Cotton Marketing Corp., Austin USA Private International Cotton and Textile Trading Co Ltd, Lugano **SWITZERLAND** Private Cottip SA, Geneva **SWITZERLAND** Private Khimji Visram & Sons **INDIA** Private Allbright Cotton, Fresno USA Private SA Goenka, Barcelona **SPAIN** Private **FRANCE** Mambo Commodities, Paris Private Montgomery Co, Inc, Lubbock USA Private Violar SA, Larisa **GREECE** Private Volcot America Inc, Phoenix USA Private ACG Cotton Marketing, Lubbock USA Private Arco Cotton Agents (I.C.T. International Cotton Trading), Milan **ITALY** Private Baumann Hinde & Co Ltd, Southport Private UK Compagnie Cotonnière Copaco, Paris 8/ **FRANCE** Private Cotton Marketing Organisation, Aleppo **SYRIA** Government Dubai Cotton Centre, Dubai UAE Government Gap Pazarlama A.S., Istanbul **TURKEY** Private Yamachu Mengyo Co Ltd Osaka, Osaka **JAPAN** Private

COTTON TRADING ORGANIZATIONS (cont'd)

(FIRMS ARRANGED BY SIZE, ESTIMATES MADE BY THE SECRETARIAT *)

Туре Company Name Country

Medium-Sized Organizations (annual volume: 20,000 to 50,000 tons)

Ecom Commodities Pty Ltd, NSW 5/ **AUSTRALIA** Private J.G. Boswell Company, Pasadena 10/ Private USA Loeb & Company, Inc, Montgomery USA Private Namoi Cotton Cooperative Ltd, Wee Waa, NSW **AUSTRALIA** Cooperative Sekhsaria Exports, Mumbai **INDIA** Private The Cotton Company of Zimbabwe Ltd, Harare ZIMBABWE Private Etem Ozsoy Tarim Ticaret Ve Sanayi As, Izmir **TURKEY** Private M. Schiefer Trading Co, Lubbock USA Private Societe d'Importation et de Commission, Le Havre **FRANCE** Private ACM, Inc, Collierville USA Private Central Cotton Company Limited, Liverpool 6/ UK Private Glencore International Ag, Baar **SWITZERLAND** Private Battistel Amiotti Srl, Milan Private ITALY TURKEY Cukurova Cotton Cooperatives Association Cukobirlik, Adana Cooperative Eastern Trading Co, Inc, Greenville USA Private First American Cotton Co, Lubbock USA Private Francis & Company, Inc., Memphis USA Private **SPAIN** Jaume Artigas, Barcelona Private Knowles-Taylor Cotton Co Inc, Matador USA Private Lyons Cotton, Inc, Memphis USA Private Pamteks A.S., Adana **TURKEY** Private Taris Pamuk Tarim Satis Koop.Birligi, Izmir **TURKEY** Private Auscott Ltd, Sydney NSW 10/ AUSTRALIA Private Cargill Tanzania Limited, Dar es Salaam 2/ TANZANIA Private Indutech Spa, Milano **ITALY** Private Rhein-Schelde Handelgesellschaft Fp Mostert Kg, Neuss **GERMANY** Private Santista Textil SA. Sao Paulo **BRAZIL** Private Société Cotonniere du Tchad Cotontchad, Paris Government CHAD TCT United SA URUGUAY Private The Sudan Cotton Company Ltd, Khartoum **SUDAN** Government Bangladesh Textile Mills Corporation, Dhaka **BANGLADESH** Government Cargill Zimbabwe Pvt Ltd, Harare 2/ **ZIMBABWE** Private Compagnie Cotonniere du Benin, Cotonou 8/ BENIN Government COTE D'IVOIRE Compagnie Ivoirienne pour le Developpement des Textiles CIDT Government Cotton Distributors Inc. Lausanne **SWITZERLAND** Private Daewoo Corporation, Seoul R. of KOREA Private FCA Comexim Ltd, Moscow RUSSIA Private Industrie Cotonniere Beninoise, Cotonou **BENIN** Government Label Coton, Cotonou **BENIN** Private Modern Nile Cotton Co, Alexandria **EGYPT** Private Newcot Ltd. Chene-Bougeries **SWITZERLAND** Private Ritis International, Cotonou **BENIN** Private Société Beninoise de Representation Sobere, Cotonou BENIN Government Société Nationale pour la Promotion Agricole Sonapra, Cotonou BENIN Private

1/ Allenberg Cotton is affiliated with Louis Dreyfus.

Sumitomo Corporation, Osaka

Volcot Switzerland Ltd. Winterthur

Taevertex, Ghent

- 2/ Cargill Cotton, Cordoba is affiliated with Cargill Cotton, Liverpool, Cargill Tanzania and Cargill Zimbabwe.
- 3/ Anderson Clayton Corp., Fresno and Queensland, Australia are affiliated with Olam, Singapore.
- 4/ Paul Reinhart AG, Winterthur is affiliated Cottagon Italia Srl.
- 5/ Ecom USA Inc, Dallas is affiliated with Ecom Agroindustrial Corp Ltd., Switzerland, Ecom Commodities Pty Ltd., Australia, EISA, Brazil and Agroindustrias Unidas de Mexico.

JAPAN

BELGIUM

SWITZERLAND

Private

Private

Private

- 6/ Plexus Cotton Ltd, is affiliated with Central Cotton Company Limited, Liverpoo.I
- 7/ Toyo Cotton (Japan) Co, Osaka is affiliated with Toyo Cotton Co., Dallas.
- 8/ Compagnie Cotonnière Copaco, Paris is affiliated with Compagnie Cotonnière du Benin, Cotonou.
- 9/ Toyoshima & Co Ltd. Nagova is affiliated with Toyoshima USA. Inc. Cordova.
- 10/ J.G. Boswell Company, Pasadena is affiliated with Auscot, Australia.

^{*} A full list, including specialized firms and contact information, is available from the Secretariat of the ICAC

COTTON BANKING ORGANIZATIONS *

Company Name	Country	Туре
ANZ Banking Group Limited, Sydney	Australia	Private
Commonwealth Bank Of Australia, Sydney	Australia	Private
Macquarie Bank Limited, Sydney	Australia	Private
National Australia Bank Group	Australia	Private
B.N.P. Paribas, Paris	France	Private
Banque Nationale De Paris, Le Havre	France	Private
Bred, Paris	France	Private
Calyon Group. Paris	France	Private
Credit Lyonnais, Le Havre	France	Private
Natexis Banque, Le Havre	France	Private
Societe Generale, Le Havre	France	Private
Bankhaus Carl F. Plump & Co., Bremen	Germany	Private
Bankhaus Neelmeyer Aktiengesellschaft, Bremen	Germany	Private
Bremer Bank, Landesbank, Kreditanstalt, Oldenburg, Bremen	Germany	Private
Bremer Bank, Niederlassung Der Dresdner Bank AG, Bremen	Germany	Private
Bremische Volksbank AG, Bremen	Germany	Private
Commerzbank Aktiengesellschaft, Bremen	Germany	Private
Deutsche Bank AG Filiale Bremen, Bremen	Germany	Private
DG Bank Deutsche Genossenschaftsbank AG, Frankfurt Am Main	Germany	Private
Die Sparkasse Bremen AG, Bremen	Germany	Private
Dresdner Bank AG, Frankfurt	Germany	Private
ABN AMRO Bank, Mumbai	India	Private
Tokai Bank, Ltd., Osaka	Japan	Private
Banco Comercial e de Investimentos, SARL, Maputo	Mozambique	Private
Rabobank International, Utrecht	Netherlands	Private
Fortis, Brussels	Netherlands, Belgium	Private
Novikombank, Moscow	Russia	Private
Rosbank, Moscow	Russia	Private
Credit Lyonnais, (SUISSE) S.A., Geneva	Switzerland	Private
Credit Suisse, Zurich	Switzerland	Private
Barclays Bank PLC, Liverpool	UK	Private
HSBC Bank PLC, Traders Services, Manchester	UK	Private
Royal Bank of Scotland Group, Manchester	UK	Private
Standard Chartered, London	UK	Private
KeyBank NA, Bellevue, WA	USA	Private
National Bank of Commerce, Memphis	USA	Private
PNB Financial, Lubbock	USA	Private
Regions Bank, Montgomery	USA	Private
SunTrust Banks, Inc., Memphis	USA	Private
U.S. Bank International Banking Group	USA	Private
Union Planters National Bank, Memphis	USA	Private
Wells Fargo Bank, Fresno	USA	Private

 $^{^{\}star}$ A full list,including $\,$ contact information, is available on the web at www.icac.org Banks that finance cotton trade

OCEAN FREIGHT ORGANIZATIONS

Company Name	Country*	Туре
T		
Transportes Fast SA., Maipu	Argentina	Private
ANL Container Line Pty Ltd., Sydney	Australia	Private
Logisticsnew Ltd., Sao Paulo	Brazil	Private
Maersk, Copenhagen	Denmark	Private
CMA- CGM The French Line, Marseille	France	Private
Delmas, Le Havre	France	Private
GETMA International, Paris	France	Private
Transports Terrestres Maritimes Et Fluviaux (T.M.F.), Docelles	France	Private
WAL West-Africa Linen-Dienste Gmbh & Co., Hamburg	Germany	Private
George A. Callitsis Succsrs S.A., Thessaloniki	Greece	Private
Interforex Shipping Agency Ltd., Piraeus	Greece	Private
Sarlis Container Services SA, Piraeus	Greece	Private
Sea Levant (Hellas) Ltd., Thessaloniki	Greece	Private
Expo Freight Pvt Ltd., Nungambakkam, Chennai	India	Private
Veneta Lombarda Spedizioni, Venice	Italy	Private
American President Lines, Osaka	Japan	Private
Kamix Corporation, Kobe	Japan	Private
Kawasaki Kisen Kaisha, Ltd., Osaka	Japan	Private
Meiko Trans Co., Ltd., Nagoya	Japan	Private
Mitsubishi Logistics Corporation, Kobe	Japan	Private
Mitsui O.S.K. Lines, Ltd., Osaka	Japan	Private
Nippon Yusen Kaisha, Osaka	Japan	Private
Shiota Kingyo Co., Ltd., Yokohama	Japan	Private
Toyo Logistics Co., Ltd, Nagoya	Japan	Private
Cignals-P Ltd., Riga	Latvia	Private
A.J. Goncalves De Moraes, Lda., Leca da Palmeira	Portugal	Private
Cargomaris Shipping & Trading Ltd.	Portugal	Private
Cargonautic AG, Zurich	Switzerland	Private
DHL Danzas Air & Ocean Tas. Tic Ltd., Izmir	Turkey	Private
Maya International Trading Co Ltd., Mersin	Turkey	Private
RJJ Worldwide Ltd., Berkshire	UK	Private
llyichevskyneshtrans, llyichevsk	Ukraine	Private
Allways Transportation Inc., Memphis, TN	USA	Private
Coppersmith Inc., El Segundo, CA	USA	Private
Logisource Inc., Mattews, NC	USA	Private
Mallory Alexander Int. Logistics, Memphis, TN	USA	Private
Mediterranean Shipping Co., Dallas, TX	USA	Private
The Kearney companies Inc., New Orleans, LA	USA	Private
TMM Lines, Houston, TX	USA	Private
Transales, Inc., Sumter SC	USA	Private
mandaled, me., duritter do	JUA	Tivato

^{*} Location of Headquarters

COTTON INSURANCE ORGANIZATIONS

Company Name	Country*	Туре
Centralia Argentina S.A., Buenos Aires	Argentina	Private
Agririsk Services PTY Limited, Sydney	Australia	Private
Activa Assurances, Douala	Cameroon	Private
AXA Group, Paris	France	Private
C. Wm. Konig Gmbh & Co. KG, Bremen	Germany	Private
H. Kraft & Co., Bremen	Germany	Private
Lampe + Schwartze KG, Bremen	Germany	Private
NHA Hamburger Assekuranz-Agentur Gmbh, Hamburg	Germany	Private
Agri Insurance Company	India	Government
National Agricultural Insurance Company	India	Government
Windsor Insurance Brokers Ltd., London	UK	Private
Agri Insurance Southeast, Inc., Tifton, GA	USA	Private
AIG Global Marine, New Yourk, NY	USA	Private
Cotton Fire & Mar. Uderwriters	USA	Private
Rekerdres & Sons, Dallas, TX	USA	Private
Zurich NA, Schaumburg, IL	USA	Private

^{*} Location of Headquarters