



Foundation for agriculture and rural areas around the world

FARM Briefings

Cotton: What is at stake for Africa ?

November 2005

S U M M A R Y

World cotton supplies have grown steadily and output is concentrated mainly in four countries: China, the United States, India and Pakistan, which account for 70% of global production. The leading importers are South Asian countries and China, where demand for cotton has constantly risen in step with the development of their textile industries. In past decades, countries in West and Central Africa have increased their cotton production to a remarkable degree and the region currently ranks second worldwide in terms of exports.

Cotton prices are both particularly volatile and on a long-term downward trend due to competition from synthetic fibres, productivity gains at production level, and the subsidies granted by several countries and groupings (the United States, China, and the EU) to their national producers. The downward trend appears to have accelerated in recent years, with prices averaging around 121 cents/kg (55 cents/lb), compared with 165 cents/kg (75 cents/lb) previously. The impact of these subsidies on prices is difficult to assess, but their abolition could lead to a short-term increase in prices of 3% to 15%, which could be followed by increased output on the part of countries with the greatest potential.

In African producer countries, cotton is extremely important in economic and social terms, providing some ten million rural people with a livelihood and thereby strongly contributing to reducing poverty in rural areas. However, the recent fall in prices has plunged African cotton companies into an acute financial crisis, threatening their very survival. Equally worrying, analysis shows that African cotton is losing ground in terms of competitiveness. Sufficient investment in research, training for producers and infrastructure are lacking. Yields are stagnating (whereas they are rising among Africa's main competitors), the introduction of technological innovations (notably of genetically modified cotton plants) is delayed, the FOB cost price is now one of the highest in the world, and even the once prized quality of the cotton is tending to deteriorate.

Confronted with this crisis, African countries have mobilized and at the Cancún Ministerial Conference presented a 'sectoral initiative in favour of cotton', demanding the elimination of subsidies and compensation for the economic losses suffered as a result of them. This initiative was not adopted at Cancún and negotiations are continuing within the WTO, so far without any outcome as a result of reservations on the part of the US and a general atmosphere which is not conducive to reciprocal concessions, in the hope of successfully completing them in time for the December 2005 Ministerial Conference in Hong-Kong. The only results obtained so far are the recognition of the need for the issue to be handled 'ambitiously, rapidly and specifically', and an offer, supported by the European Union, of development assistance to up-grade the competitiveness of the African cotton sector. The current fragile situation of this sector and its economic and social importance argue in favour of rapid implementation of this assistance. Nothing justifies that it should be contingent on the outcome of discussions about subsidies. ■

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1 - Cotton production, consumption, world trade and prices

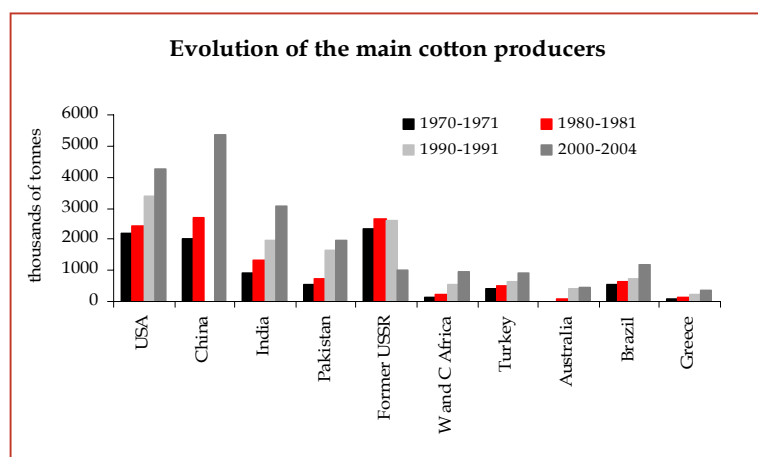
Production is increasing, especially in Asia and the emerging countries

According to the International Cotton Advisory Committee (ICAC), world cotton production was 24.9 million tonnes in 2004-2005, confirming the overall upward trend of an average of 2.2% per year in the last 30 years. Production is distributed among about a hundred countries, with 59 growing cotton on more than 5,000 hectares, but supplies are strongly concentrated in four countries (China, the United States, India and Pakistan) that account for 70% of production today. This concentration is not new but it has increased in recent decades as Chinese and Indian pro-

duction has grown strongly at twice the average world rate of increase. **The continuous growth of production in West and Central Africa is also noted; this has doubled during each of the past three decades and its share in world production has grown from about 1% in 1970 to over 4%.** Finally, the recent rapid growth of Brazilian production is noted; this should continue in the coming years.

Trade is concentrated in southern Asian countries and China as a result of the delocalisation of the textile industries

A third of world cotton production is exported, making it one of the most traded agricultural products. The main consumers are China, followed by India and Pakistan, with the three countries representing more than 50% of world consumption. The consumption of these countries is growing rapidly as a result of the development of their textile industry, especially since the end of the multifibre arrangement at the beginning of 2005; this put an end to the textile import quotas in developed countries. Conversely, consumption in the United States and Europe is tending to decrease as a result of the delocalisation of their textile industries. In spite of the scale and speed of growth of their production, India,



Cotton production in the leading countries from 1970 to 2004 (thousands of tonnes) *

	Average growth 1970-2004	1970-1971	Growth 1970-1980	1980-1981	Growth 1980-1990	1990-1991	Growth 1990-2004	Average 2000-2004
USA	2.2%	2219	0.9%	2422	3.4%	3376	2.4%	4261
China	3.4%	1995	3.1%	2707	-	-	-	5363
India	4.1%	909	3.8%	1322	4.2%	1989	4.5%	3077
Pakistan	4.4%	543	2.8%	714	8.7%	1638	1.8%	1949
Former USSR	-2.8%	2342	1.3%	2661	-0.3%	2593	-9.1%	998
W. & Central Africa	6.6%	140	4.8%	224	9.6%	562	5.5%	964
Turkey	2.7%	400	2.3%	500	2.7%	655	3.3%	902
Australia	11.1%	19	17.9%	99	15.9%	433	0.2%	441
Brazil	2.6%	549	1.3%	623	1.4%	717	5.1%	1183
Greece	4.2%	110	0.4%	115	6.4%	213	6.0%	380
World	2.1%	11740	1.7%	13831	3.2%	18970	1.5%	21971
% W. & Central Africa **		1.19 %		16.2%		2.96%		4.39%

* Source: AfD and ICAC

** Benin, Burkina Faso, Cameroon, Central African Republic, Chad, Côte d'Ivoire, Mali, Niger, Senegal and Togo

Pakistan and China above all have become leading importers. **Chinese imports are large and fluctuate according to local weather conditions and can have a determinant impact on world market balance and hence on prices.** The main exporter is the United States, followed by the

West African producer countries as a whole, who now export 13% of world flows and have become a weighty player in the cotton trade.

World demand peaking because of competition from synthetic fibres

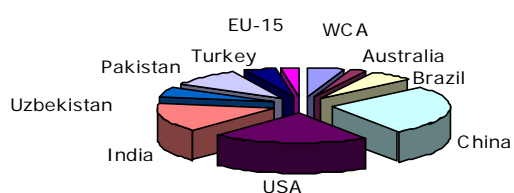
Although world consumption has followed the production trend, per capita consumption has remained fairly stable and the share of cotton in raw materials for textiles has tended to decrease in favour of synthetic textiles whose quality has improved continuously. **The share of cotton in synthetic fibres as a whole has thus decreased from 60% to 40% over a 30-year period.** The market shares held by cotton and lost to synthetic fibres seem to be an underlying trend unconnected with cotton prices as no study has succeeded in demonstrating any correlation between the trend in market shares and the relative prices of the different fibres. However, it is not impossible that the upward trend in oil prices, which affects the price of polyesters, might have in the future a favourable effect on demand for cotton and hence on prices.

Main producers, consumers, importers and exporters from 2002 to 2004 *

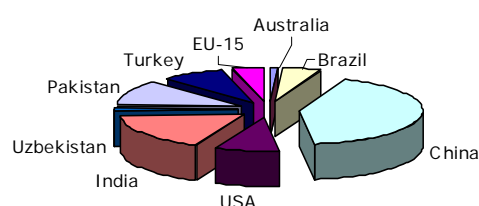
Main countries (000 tonnes)	Production	Consumption	Exports	Imports
West and Central Africa	963	191	889	0
Australia	441	19	487	14
Brazil	1183	852	236	95
China	5363	7250	69	1448
USA	4261	1424	2834	10
India	3077	3033	114	190
Uzbekistan	998	274	711	1
Pakistan	1948	2133	74	268
Turkey	902	1397	59	565
EU-15	466	734	350	585
World total	21970	22141	7054	7106

**Source: AfD, after USDA data*

Production

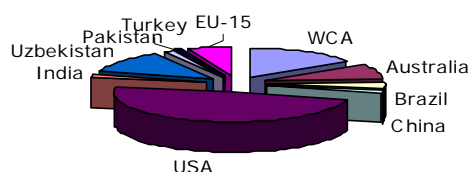


Consumption

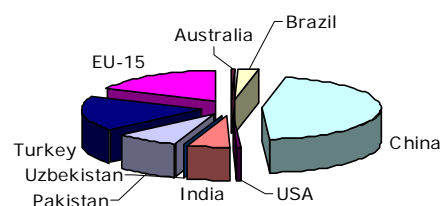


Source: plotted using

Exports



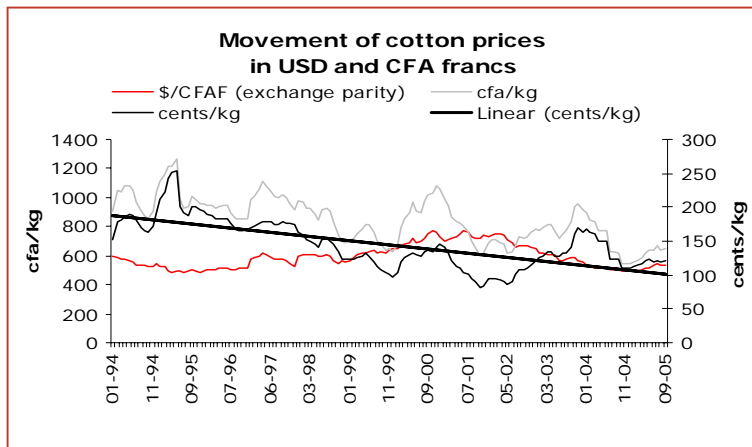
Imports



The downward price trend seems to be accelerating

Cotton prices display a long-term decrease (-0.24% per year in the last 40 years)¹; this is twice as rapid as that of agricultural raw materials as a whole. They are also more volatile than those of most other agricultural raw materials. The downward trend seems to have become more marked in the last 15 years, as have the scale and frequency of slumps. Fluctuations in the EUR:USD exchange rate increase price volatility in the CFA franc zone and can considerably aggravate crisis situations, as is the case today.

Medium-term price forecasts vary according to the institutions and depend on hypotheses concerning the evolution of Chinese production (whose growth may or may not slow as a result of competition with food crops), elasticity of demand in relation to price and above all the levels of the subsidies awarded by certain countries for cotton production and export. However, analysts agree that the price will not return to the average 165 cent per kg (75 cents per lb) observed for the past 30 years (while the average price has been 121 cents per kg or 55 cents per lb over the last four years) even if a price of some 60 cents can be hoped for in the medium term (ICAC forecast for 2008).■



Source: plotted using ICAC data (in constant currency)

1- Source: ICAC and World Bank.

2 – Cotton support measures and their effects on prices

Cotton production is the subject of various support measures, mainly in three countries or sets of countries: the United States, the European Union and China. The responsibility of these policies in the cotton market slump in recent years and the resulting damage to small producer countries that are strongly dependent on their cotton exports has been the subject of intense discussion for several years and is at the heart of multilateral trade negotiations.

American support measures

American agriculture has numerous support methods for cotton:

- **direct support** is aid that has been decoupled since 2002 (i.e. not related to production and areas farmed except by historical reference to a previous period); this is classified as Green Box aid²; however, some authors consider that this aid results in distortion on the world market insofar as it enables certain cotton farms to survive or encourages some farms to increase their area in the hope of a new calculation of the historical reference period and insofar as a condition is not to grow certain produce such as fruit and vegetables;
- **counter-cyclical payments** are made according to the production area when the price of cotton falls below a threshold (72cts/lb); the producer receives the difference between the market and threshold prices. This is in the Amber Box category³;
- **marketing loan payments** are short-term funding to enable producers to wait for a rise in price to sell cotton after the harvest. The producer can repay the loan at the market price if the latter is lower than the support price. This price-related aid is in the Amber Box;

²- This category refers to support measures for agriculture (i.e. subsidies) that meet the general and specific requirements of Annex 2 of the WTO Agreement on Agriculture. This type of measure should generally be funded by the government and not include price support; this category was approved, that is to say that the measures concerned are not subjected to reduction commitments.

³- This category refers to price and production support measures that have had to be reduced or abolished following the WTO Agreement on Agriculture. This type of support was quantified in the Uruguay Round by the aggregate measure of support (AMS) that must be reduced for each country in conformity with the commitments made within the framework of the WTO.

- **user marketing certificates (step 2)** are payments aimed at favouring the export and use of American cotton in industry. The first part of the aid consists of an export subsidy and the second is a subsidy awarded to American industry for the use of American cotton. These types of subsidy are prohibited by the WTO and are therefore naturally classified in the Amber Box;
- **insurance-credit payments** provide cover for natural catastrophes and market fluctuations. These payments are authorised by virtue of a *de minimis* clause⁴ if they do not exceed 5% of the total annual value;
- **export credit measures** are considered as export credit (Amber Box) as they provide particularly favourable credit conditions;
- **subsidies by virtue of the law on extraterritorial income** are export subsidies awarded by means of tax reduction. They are in the Amber Box category.

All this aid represents some USD 2 thousand million per year, that is to say nearly USD 500 per tonne produced or 37% of the market value of production.

European support for cotton

The European Union has provided support for cotton since 1981 within the framework of the Common Agricultural Policy. Greece and Spain are the beneficiary countries. Support corresponds to the difference between the market price and a reference price set at €1.063 per kg in 1999. The support is paid to industries, which pass it on to producers. Production qualifying for support has ceilings of 782 000 tonnes for Greece and 249 000 tonnes for Spain. A penalty of 0.6% of the price for each percentage point is applied in case of over-production. It is also considered that European cotton benefits from indirect subsidies in credit for the purchase of equipment, insurance and irrigation, often funded by the public authorities.

⁴- This measure enables WTO members to exclude support below a certain threshold from the Amber Box (that is to say the Aggregate Measure of Support). For the developed countries, this threshold has been set at 5% of the value of the production of the agricultural product concerned.

The mechanism received in-depth revision in May 2004 as the EU Council of Ministers had adopted a decision concerning reform of domestic support for cotton, with the decoupling of 65% of the support previously awarded. This is paid regardless of farmers' areas under cotton and their cotton production, with the balance of the support (35%) still related to the cultivated area but applied to an area 4% greater than the 2000-2002 average. **The reform is to be implemented in 2006.** A mechanism will also be set up to evaluate the effects of European subsidies on world cotton production and trade over the period 2006-2009. Most specialists find it difficult to evaluate the real effect of these reforms today. It will depend mainly on the desire of European producers to grow a crop other than cotton with the same level of subsidy, as will be allowed by the decoupling.

Chinese support for cotton

The Chinese government sets a reference price for cotton, generally above world prices, but has permitted freely negotiated prices between producers and buyers since 1999. Domestic prices fell after this reform and domestic support was thus decreased.

An export subsidy is added to this domestic support and is aimed at making up the difference between the domestic price and the world price, but it carries little weight because Chinese exports are small.

China has also maintained customs duties on cotton imports in order to conserve the competitiveness of Chinese cotton. Tariffs were reduced by 15% after China joined the WTO, but an import quota system was set up. The basic customs tariff is 3%, to which is added 1% for below-quota imports (800,000 tonnes) and 40% for over-quota imports.

Support tends to weigh on prices but this is difficult to measure

Given the complexity of the mechanisms (and especially the distortional (or not) character of decoupled aid), it is difficult to evaluate the total amount of support that causes distortion, especially as the amounts vary considerably according to the year according to world prices. ICAC estimates—generally considered to be reliable—take all subsidies into account except for support that does not concern prices or incomes directly (subsidised credit for example). Support is estimated as follows (*see Table*).

This support certainly has a downward influence on prices as has been shown by the various impact studies conducted in recent years⁵. However, the impact calculated from models developed in the various studies varies considerably according to the hypotheses chosen concerning the elasticity of demand for cotton and production in relation to price. In a recent publication, ICAC considered that without subsidies prices would have been 5 cents per lb higher (i.e. 11 cents per kg or 10% of the average price) in 2002-2003 and 2003-2004. In a general manner, the estimates that seem most plausible show a short-term effect on prices of between +3% and +15%. There is more doubt with regard to the long-term effect insofar as it depends on the reaction of supply. Whatever the extent of the impact, it is also most possible that the very existence of price or income support in some of the major producer countries slows (or hides) market signals to producers and therefore delays the adjustment of supply to demand and thus amplifies price volatility.

⁵- FAPRI study (2002), Goreux study (2003), ODI study (2004), FAO study (2004).

Cotton subsidies in thousand million dollars

Country	1999	2000	2001	2002	2003	2004 (estimate)
United States	2.1	1.0	3.0	2.0	1.0	2.2
EU	0.8	0.7	1.0	1.0	1.0	1.1
China	1.5	1.9	1.2	0.8	1.3	1.1
Total	4.8	3.8	5.8	3.8	3.4	4.7

Source: ICAC data

The abolition of support would not only have an effect on prices but also result in decreased production in the uncompetitive countries awarding support—and first and foremost the United States and the European Union⁶. This decrease would probably benefit first the most responsive

and competitive countries like Brazil and India that have the capability to increase production very rapidly. ■

⁶ The FAO study evaluates the impact of the abolition of subsidies at -15% for the United States and -31% for the European Union.

3 – The role of cotton in the economies and agrarian systems of African producer countries

Cotton growing and the cotton sectors in West and central Africa

Cotton is grown in West and central Africa between isohyets 800 and 1200 in three main production belts located respectively in Mali, Burkina Faso and Côte d'Ivoire, in Togo and Benin, and finally in Cameroon and Chad. Cultivation is mainly rainfed in a zone subject to severe meteorological uncertainties. Mechanisation is practically non-existent, making the crop very labour intensive, with labour forming 60% of production costs. It is grown on small family farms, with the cultivated area per holding varying from less than 1 hectare (in Cameroon) to about 3 hectares (in Mali). Cotton requires fairly substantial weeding, regular spraying for pest control and fertilisation. It is rotated with food crops and especially maize.

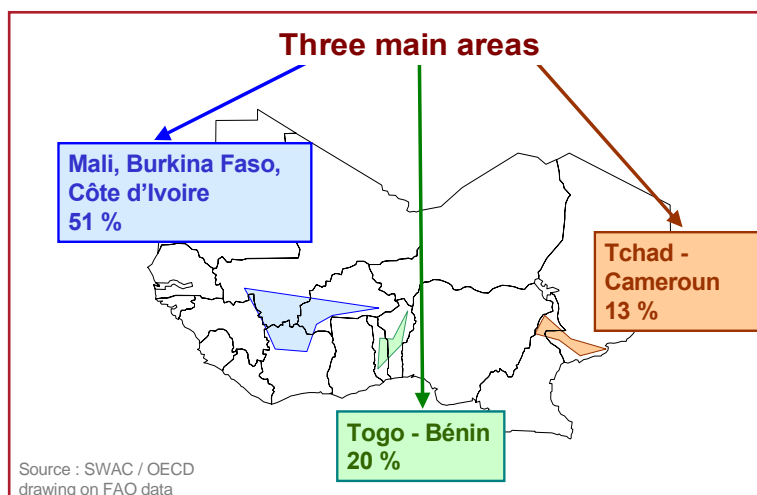
Historically, cotton was introduced in the CFA zone countries by a French public enterprise, the CFDT (called DAGRIS today) that set up in each country a strongly integrated sector centred on a national company that provided inputs on credit and management of growers, then purchasing the cotton in a monopoly situation for ginning and sales on the world market. The cotton companies have been privatised (and sometimes split into regional companies) little by little since the end of the 1990s, but with the maintaining in most of the countries of a monopolistic purchase system with a price fixed for each season. **Cotton is one of the rare success stories in agricultural development in most of the countries concerned as a result of the**

substantial development of production achieved and its numerous beneficial effects on the rural world (*see graph*).

Cotton has a substantial macroeconomic impact in Sahel producer countries

The economic impact of cotton varies according to the scale of production and other export resources:

- **cotton exports** from the 9 CFA zone producer countries⁷ achieved average total annual earnings of CFAF 600 thousand million (EUR 915 million) during the period 2000-2005. The share of cotton in total export income is particularly great in the Sahel countries where there are no other cash crops. It forms two-thirds of export income in Burkina Faso and Benin and is substantial in Mali (28% of earnings) and Togo (30% of earnings). In contrast, the share is smaller in the other countries (less than 10%);
- **the share of cotton in the GDP is between 5 and 8% depending on the year in the Sahel producer countries** (6.9% in 2000 in Burkina Faso, 5% in Mali and 5.1% in Chad). The proportion doubled on average from 1980 to 2000 with the increase in production, showing the significant effect of the cotton sector on overall economic growth. When related to agricultural GDP alone, cotton contributes some 12 to 20% of value-added according to the country and the year, showing the capital importance of cotton in the rural economies of these countries. Certain simulations⁸ reveal the non-negligible effect of cotton prices on the growth rate: a 5 cents per lb fall in the price of cotton was estimated to lower the GDP by 0.13 point in Mali and 0.18 in Burkina Faso;
- **in terms of fiscal returns**, the cotton sector is also important, although this varies considerably according to prices and cotton company profits or losses. It is estimated that the sector in Burkina Faso generated directly or indirectly between CFAF 14 and 25 thousand million (i.e. between EUR 21



⁷- Benin, Burkina Faso, Côte d'Ivoire, Mali, Chad, Senegal, Togo, Cameroon, Central African Republic and Niger.

⁸- 'Jumbo' model, AfD.

and 38 million) of VAT and customs duties annually from 2000 to 2004⁹ (this is some 4 to 7% of total income from tax);

- finally, *cotton is an important provider of rural jobs* because of labour-intensive cultural practices. It is estimated that growing one hectare of cotton requires 110 to 150 man-days of labour, making it possible to calculate that each tonne of cotton fibre produced represents approximately 320 man-days of labour by either a paid worker, the farm operator or his family. The paid jobs created by the cotton companies are added to this work in agriculture.

The impact on rural incomes and poverty is very great in the production zones

In the Sudan-Sahelian zones where it is grown, cotton is the only cash crop whose price is known in advance and which has an assured market. Apart from the question of cash income, these features enable access to loans and a certain degree of intensification. Producers' margins in 2003 after payment for inputs were CFAF 110,000 per ha in Burkina Faso and CFAF 123,000 per ha in Mali. In the same year, the net margins after inputs distributed to producers were some CFAF 44 thousand million in Burkina Faso (200,000 growers) and CFAF 62 thousand million in Mali (170,000 growers)¹⁰. This flow of money into the rural economy has a strong impact, with the direct effect enhanced by the numerous induced multiplying effects on populations that do not depend directly on cotton. The multiplying effect was estimated to be 3.3 in a recent study in Benin¹¹. It is estimated that cotton in Burkina Faso provides a direct or indirect livelihood for 2 million people, that is to say 17% of the population. Extrapolation of the data on Burkina Faso for the 9 CFA countries shows that **cotton provides a living for some 10 million people (with total production of 1 million tonnes)**.

The income that it distributes makes

cotton a key component in the strategy of the fight against poverty that is the major development objective in all the countries concerned. We know that poverty in the Sahel countries is a rural phenomenon above all, even if the cotton belts are doubtless less affected than the zones where only food crops are grown. Poverty in the cotton belts thus decreased from 50% to 42% in Burkina Faso from 1994 to 1998 while it increased by 2% in the food crop zones¹².

The long-term impact on rural dynamics is also capital

In addition to the impact of distributed monetary income, cotton is an important factor in dynamism and development in the areas concerned:

- it enabled the cotton companies – at a time when prices made this possible – to improve the network of rural tracks and thus open up the production zones (although this progress is compromised today by the difficulty of maintaining this infrastructure);
- it considerably improved the agricultural techniques used by farmers. Thanks to cotton and the accompanying extension services, they are now familiar with the use of inputs and pesticides; likewise, the short term loans arranged by the cotton companies are often the only ones available for the purchase of inputs. The medium-term loans also set up are often the only way for farmers to gain access to animal draught cultivation, and this has developed strongly in all the cotton belts;
- the development of cotton has had a positive direct effect on maize growing (it is used in rotation with cotton and benefits from the carry-over effect of fertiliser) and thus improves and increases the security of the meeting of food requirements at the national level;

9- Développement de la culture cotonnière au Burkina Faso; 2004. French cooperation and AfD.

10- Étude comparée des structures de coûts au Burkina Faso, au Mali et au Cameroun; Gergely (AfD 2004).

11- Minot and Daniels (2002).

12- Développement de la culture cotonnière au Burkina Faso; 2004. French cooperation and AfD.

- finally, cotton has enabled the gradual structuring of the farming world in professional groups and associations at village, department, regional and country level. These groups and associations were first active in input distribution and cotton collection and are now called upon to play an increasing role in all the aspects of development of the sector and the handling of their own development by farmers. Although the degree of structuring varies according to the country and is still fairly fragile in general, it is a capital feature for the future development of farming dynamics.

In spite of their strategic importance, the cotton sectors are seriously endangered today by the fall in prices

In the face of the downward trend in prices, the only adjustment variable available to the cotton companies to balance their accounts (once they have made the cost savings that are possible) is obviously the price paid to producers. Depending on the country, this is set by the companies or by negotiations within the sector. There is nonetheless limited room for manoeuvre in this area, if only because there is a discouragement threshold beneath which growers would abandon cotton, even if they had hardly any other alternatives. This would further deepen the deficits of the companies through

difficulties in covering their fixed costs. With a world price of 55 cents per lb, which seems to be the reality today, Burkina Faso, whose sector displays average performance with regard to intermediate costs, would have to pay CFAF 130 to FCFA 140¹³ per kg for seed cotton in order to balance the management of the cotton companies. This is more than 20% lower than the contractual price decided by the interprofessional body. None of the cotton companies has been able to perform a downward adjustment of this scale; AfD simulation shows that it would have resulted in substantial decreases in production resulting in a decrease in GDP growth that would have been difficult to bear¹⁴. Thus, the losses by the cotton companies for the 2004-2005 season attained CFAF 45 thousand million in Mali, 18 thousand million in Burkina Faso, Cameroon and Benin and 21 thousand million in Chad. The companies are incapable of absorbing such losses without help from outside. Given the present prices, this catastrophic situation may be repeated in 2005-2006, although Mali has made a drastic reduction in the price paid to producers. ■

¹³- Selling price of cotton: 55 cents per lb, i.e. CFAF 640 per kg.
CIF costs: CFAF 40 per kg.
intermediate costs of the cotton company: CFAF 250 per kg.
the difference gives a producer equilibrium price of CFAF 350 Fper kg of lint, i.e. CFAF 140 per kg of seed cotton.

¹⁴- For the countries most dependent on cotton this goes as far as a decrease of 4 to 5 percentage points of growth in the two years of the season; 'Jumbo' model (AfD).

4 – Production costs in the world and the competitiveness of African cotton
African cotton yields are not following world trends

Yields at the world scale are increasing continuously and have risen from an average 400 kg per ha in 1980 to 654 kg in 2005. The yields in West and Central Africa practically doubled from 1960 to 1980 but have progressed little since then and have peaked at about 450 kg per ha for about 10 years, with little noteworthy prospect for improvement in the present crop management sequences, for lack of massive investment in research. In contrast, China (where most of production is irrigated) has experienced the most spectacular increase, in particular thanks to substantial government support in varietal research and development. **In addition to the small progress in research, an explanatory factor for the difference in yield between Africa and the rest of the world is that production in Africa is solely rainfed whereas 55% of the cotton grown in the world is irrigated.**

The competitiveness of African cotton has decreased markedly in recent years

Although it is fairly easy to find out the production costs of African cotton as the sectors are organised by cotton companies that master all the operations involved and, because of their public or semi-public status, have obligations as regards transparency, this is not always the case in the other production zones where the only source of information available is the survey performed by ICAC every three years. However valuable this survey may be, it is difficult to interpret insofar as the countries that reply do not always use the same methodology to calculate their costs.

For West and Central Africa, a recent study conducted in three countries (Mali, Burkina Faso and Cameroon (*see Table*)¹⁵ shows that

the cost of fibre production FOB in an African port has increased very slightly in local currency (CFA francs) in the last four years, but has increased strongly in current dollars because of the strengthening of the euro, to which the CFA franc is linked, against the dollar.

If this cost is compared with the average world production cost calculated by ICAC (\$ 1.14), it is seen that West African cotton, grown almost only in the CFA franc monetary zone, had a competitive advantage in 2000 that it no longer possesses today, mainly because of the rise of the euro against the dollar, while the market operates in dollars and the currencies of most of the exporting countries are more or less linked to the dollar. This factor is aggravated by the fact that domestic inflation means that the African countries in the CFAF zone have been unable to benefit from the favourable effects of a strong currency on the cost of imported inputs (fertiliser, pesticides, etc.). At its 2004-2005 cost level, the price of CFA African cotton is distinctly lower than that of the USA (average \$ 1.48 per kg) and Europe, but higher than that of Pakistan (\$ 0.96), Argentina (\$ 0.77), Brazil (\$ 0.98 in the Nordeste) and China (\$ 1.02).

Comparison of the cost structures in the different countries, with all the reserves required with regard to the homogeneity of the calculation methods, suggests the following features:

- that the per-hectare agricultural production costs are still very distinctly lower in Africa (\$ 395 per ha in comparison with the world average of \$ 617) as a result of the absence of irrigation and the low degree of mechanisation (limited to tillage in certain cases);
- that this per-hectare advantage disappears

¹⁵– Comparison of production costs in Mali, Burkina Faso and Cameroon; AfD (2004); Nicolas Gergely.

Average for Mali, Burkina Faso and Cameroon	2000-2001 results	2004-2005 results
Purchase from grower* in CFAF/kg seed cotton	176	191
Purchase from grower per kg lint (CFAF)	440	455
FOB cost/kg lint (CFAF)	687	695
CFAF:dollar exchange rate	732	527
Cost FOB/kg lint (in current \$)	0.95	1.3

**It is assumed that the purchase price from the producer is the same as the production cost*

when the cost is set against production as a result of the smaller yields: the production cost of African cotton is \$ 0.36 per kg of seed cotton against the world average of \$ 0.33 (the levels are similar in Asia and South America at between \$ 0.32 and \$ 0.34; Europe is by far the least competitive zone at \$ 0.70, and Australia is the most competitive at \$ 0.21)¹⁶.

- that Africa's competitive disadvantage is doubtless essentially downstream of production (transport, ginning, administrative and management costs) because of the comparative remoteness of the production zones from the main ports, the poor condition of tracks, the dispersion of the production zones and the important (and essential) role played by the cotton companies in supervising small growers.

African cotton has a natural advantage in terms of quality but risks losing it

Cotton fibre from West and central Africa is reputed for its high overall quality, but this advantage is threatened today. African cotton is considered to be more homogeneous than American cotton, even if it is not as white, because of similar natural conditions throughout the cotton growing zone and the limited number of varieties grown. With regard to fibre length, 60% of African production is above the Cotlook Index threshold against 40% of US production. Another advantage is that as African cotton is picked entirely by hand, the end-product is likely to contain less residues and damaged lint, enabling better yarn production. These factors explain that the African cotton has a some one third share in quality cottons. The image of African cotton seems to be worsening in spite of these advantages, in particular because of contamination of fibre by foreign bodies, such as residues of polypropylene packaging which is very harmful for spinning. The problem is aggravated by the increase in volumes and logistics that are not always up to standard with regard to storage and transport conditions. This explains why there may be a depreciation for African cotton instead of the higher price that it would be legitimate to expect. Some authors consider

that contamination leads to a price decrease of about 10 cents per kg.

In addition to factors concerning physical quality, African cotton has a disadvantage in comparison with US cotton with regard to marketing quality. The quality grading of American cotton is more precise thanks to the widespread use of sophisticated grading techniques (HVI), more reliable shipments resulting in particular from high-quality infrastructure and more rapid shipping as a result of more frequent shipping services. Finally, the shifting of the outlet for African cotton from Europe, which used to be its main customer, to the Far East has resulted in higher freight costs, reducing the FOB prices that the African cotton companies can ask for.

Overall, the competitiveness of African cotton in terms of yield, production cost and quality is tending to decrease in relation to world competition with continuous technical progress. This threat weighing on African cotton is the result of external factors and also of internal factors in the African sectors.

Improvements are possible but at the cost of sustained financial efforts

Strategies for improving the competitiveness of African cotton in terms of costs are possible in the face of these challenges:

- increasing yields and reducing production costs: the crop management sequences proposed by supervision agents have not always been followed, resulting in field yields that are much lower than those achieved under station conditions. An effort is therefore needed to understand farmers' strategies, to provide explanation and training for producers and to adapt management sequences. Research on varieties could also lead to the development of more productive varieties. Crop protection costs could be reduced substantially, in particular by rationalised insect pest control;
- promoting the sustainable management of soil fertility (a serious risk in the long term) through better integration of crop and livestock farming and the introduction of fertility maintenance techniques;

¹⁶- ICAC data.

- the use of appropriate support and advisory services to achieve integrated farm management and rationalised diversification. This would make it possible to render the farmer's overall income secure while conserving the same level of returns from cotton.

These approaches require:

- the re-launching of the research sector, which has benefited from little in the way of means in recent years, together with better training of producers and effective dissemination of knowledge, in particular through the structuring and capacity strengthening of the professional organisations that are still fragile in most of the countries;
- improved quality to enable African cotton to recover its natural advantage is possible through the training of producers; this must be accompanied on the one hand by the appropriate encouraging measures and on the other by greater involvement of the cotton companies in logistics. It also requires substantial investment that is difficult to achieve without support from outside, given the present situation;
- improved infrastructure and environment are also essential as the present situation forms an additional handicap for African cotton. For example, good maintenance by the state of the increasingly deteriorated cotton tracks as the cotton companies can no longer handle this because of the slump, better transport conditions from the mills to the port, good socio-educational structures in the cotton belts to reduce illiteracy, and **the strengthening of farmers' organisations.**

Finally, **transgenic cotton is a pathway that Africa cannot ignore, especially as it forms a substantial, increasing proportion of production elsewhere in the world (in particular in China, the United States and Australia).** The ICAC estimates that **transgenic cotton accounts for 30% of production and the proportion should attain 60% in 2006.** Bt cotton, incorporating a gene resistant to certain crop pests, is the main transgenic cotton grown. Its adoption in China is partially responsible for the cotton boom and has made it possible to considerably reduce sprayings and hence production costs and also decrease risks for human health and the environment. Its use results in improvements in yield that vary according to pest pressure (11% in Mexico but 65% in South Africa). Given the higher cost of seed, the impact on growers' incomes depends on the degree of infestation by pests susceptible to the Bt cotton gene. It is suggested in a recent study that the introduction of this variety in West Africa could result in an increase of returns for growers of \$ 130 to \$ 209 per hectare. Introduction nevertheless requires sufficient national research capacity to evaluate and adapt such innovations, reliable procedures for the prevention of biotechnological risks and negotiations with the multinational corporations that own the patents. ■

5 – The African initiative for the abolition of subsidies and the ongoing multilateral negotiations

African mobilisation to fight the cotton slump

In 2001, producers' organisations from various African countries met in Bobo Dioulasso in Burkina Faso to make a formal appeal to the United States and Europe to stop subsidising their cotton production. In the following year, procedures were undertaken by these producers' organisations to gain support from the West African Economic and Monetary Union (WAEMU) and to alert the WTO. In parallel, stakeholders in the African sectors organised themselves at the level of the continent and the African Cotton Association (ACA, with headquarters in Cotonou) was founded in June 2001 by professionals in the private cotton sector to facilitate the improvement of the quality of African cotton and to defend their interests.

More recently, in December 2004, the African cotton farmers' associations founded the **African Cotton Producers Association** (APROCA), whose objectives are to group all the producers' organisations operating in Africa, to promote solidarity among member organisations, to enhance dialogue and cooperation between members to address questions of common interest, to gather, process and disseminate all information concerning cotton, to defend producers in the face of any distortion of the world market and to discuss experience among the member organisations. APROCA currently groups organisations of professional farmers in Benin, Cameroon, Mali, Senegal, Togo and Burkina Faso, whose president is also the president of APROCA. Since their founding, APROCA and ACA have played an active role in mobilisation against cotton production subsidies in rich countries.

Mobilisation continued in 2002 and 2003 and, with active support from certain NGOs and donors, made it possible to hold various workshops and to conduct a number of studies and analyses to build up a solid dossier.

The sectoral initiative for cotton and the failure of Cancun

Four sub-Saharan countries, Benin, Burkina Faso, Mali and Chad, delivered a docu-

ment entitled 'Sectoral initiative in favour of cotton' to the WTO Agriculture Committee on 30 April 2003. This initiative marked a turning-point in the attitude of the LDCs and completed the process of initial mobilisation of the African countries concerned to react to a catastrophic movement of prices. The heads of state of Burkina Faso, Mali and Benin actively supported the initiative, in particular by presenting it to the US Congress and President Bush.

The document was examined at Cancun during the work of the 5th WTO Ministerial Meeting (September 2003). The text gives a reminder of the undertakings taken at Doha with regard to the role of trade in development and the remedy to be applied to the distortions in world agricultural trade, especially when they concern the least developed countries. Two solutions are put forwards for settling the specific question of cotton: first the setting up in Cancun, without waiting for the completion of the Doha Round, of a plan for the abolition of support over a period of three years and also transitory measures in the form of compensation for the losses suffered until subsidies have been abolished (the losses suffered by the African countries had been estimated at 250 million dollars in a study by Louis Goreux published several months previously).

The initiative made a lot of noise and was supported by most of the members of the Cairns Group and a large number of the G90 member countries (LDCs, ACP countries, African Union). However it immediately came up against the reticence of the USA, which first tried to defuse discussions by means of a counter-proposal aimed at broadening the abolition of subsidies to the whole of the textile sector, and then categorically refused any calling into question of its cotton subsidies. The European position was more ambiguous. While supporting the African initiative, the European negotiators claimed that the European subsidies were not export subsidies and had no impact on prices and therefore did not need to be abolished. The United States and Europe also rejected the idea of compensation, but without closing the door to the idea of financial transfer in

the form of aid for development. These reactions led to the blockage of the cotton dossier and this doubtless contributed to the overall failure of the conference.

The Brazilian complaint to the WTO

The African countries chose negotiation rather than a complaint to the WTO in order to defend their cotton interests. Brazil did not have the same attitude and decided to contest US subsidies for cotton (especially the various export subsidies and certain aspects of direct payments); following fruitless attempts at bilateral negotiation, it lodged a complaint with the WTO in March 2003, with Benin and then Chad as third parties. Brazil won in September 2004 with confirmation after appeal in March 2005, with the Dispute Settlement Body considering that the US regulations in question were contrary to the agreements of the Uruguay Round (that is to say preceding the ongoing Doha Round negotiations that were intended to go further than the preceding round). The judgement stipulated that the United States should in particular change their direct payment system and abolish export subsidies within a 'reasonable' period of time to be negotiated with Brazil. In principle, this judgement strengthens the African position, but the United States is attempting to make the changes to its subsidy system seem to be a concession within the framework of the current Doha Round negotiations.

Changes since Cancun and the present position

After the failure of Cancun, negotiations continued at the WTO within the framework of preparations for the Hong Kong conference in December 2005, the next stage in the Doha Round.

The four countries involved in the cotton initiative took a softer line and specified their position a few weeks after Cancun by lodging a new draft for the ministerial conference statement on the subject of cotton (paragraph 27) with the WTO secretariat. This draft refers to the urgent need to ad-

dress trade distortions in cotton and to the African cotton initiative. It proposed specific measures including the elimination of export subsidies in three years and the elimination of production subsidies in four years and the creation of a transitional fund to support the cotton sector in the cotton-producing and -exporting LDCs; this would remain until the total elimination of all subsidies. The new proposal did not change the situation and in December 2003 the Chairman of the WTO had to observe the blockage concerning the question of the way in which cotton should be handled as a separate dossier or as part of overall negotiations.

An important post-Cancun stage was reached in July 2004 with the adoption by the General Council of the WTO of a working programme within the framework of the pursuit of the Doha negotiations. The importance of the cotton initiative was reaffirmed in the general part of the text (commonly referred to as the 'July package') and the developed countries were invited to work on the development aspects of cotton in their bilateral and multilateral programmes. Consultations were also planned between the Director-General and other international organisations for existing or future programmes to take more accounts of the development needs of the countries dependent on cotton. **The text of the part devoted to agriculture planned that cotton would be '... addressed ambitiously, expeditiously, and specifically...'** within the agricultural negotiations and in relation to the cotton initiative. The Committee on Agriculture would ensure 'appropriate prioritization of the cotton issue' and this would be addressed in a subcommittee on cotton to be set up. The work would cover the three pillars of agricultural negotiations (market access, domestic support and export competition). This text was capital for the future of the negotiations and thus formed progress in the importance awarded to cotton, mention of the cotton initiative and the specific treatment that it should receive (corresponding to the pressing demand from African countries) but conserving a degree of ambiguity with regard to the real scope. In contrast, it did not take up the question of the request for compensation

or support fund, replacing these by the development component.

The cotton subcommittee was indeed formed in November 2004 and has since met at regular intervals. **At the meeting in May 2005, the African countries lodged a proposal repeating the 2003 requests (accelerated abolition of subsidies and an emergency fund),** but no true negotiation was held on the proposal within the subcommittee—either in May or at the subsequent meetings. The situation is therefore frozen for the moment and the very principle of specific negotiation on cotton, independently of the progress of the other dossiers, is far from receiving unanimous approval in the committee, and especially from the United States and, to a lesser degree, from the European Union. Each fears that a concession on cotton would set a legal precedent and weaken positions on the main dossiers defended (in particular import dues and decoupled domestic support). This ambiguity is far from encouraging in a context in which negotiations on the other dossiers are also marking time and where some people seem to be resigned to accepting failure in Hong Kong given the scale of the problems to be solved and the difficulties and political cost required to reach a general agreement.

In this context, there is a risk that the African countries cannot without inconvenience make the elimination of cotton subsidies a condition for their approval, as they had done in Cancun, as it is not as clear as before that the main parties truly desire an agreement and a pretext for failure would thus be welcome.

The positions of the parties

Given its strategic interest for Africa, Europe obviously plays a key role in the cotton dossier. At the forum on cotton held in July 2004 in Paris, the European Union proposed a Euro-African partnership on cotton combined with an ambitious programme of actions with different components: improvement of international trade conditions (support for the African sectoral initiative),

the development and support of national and regional strategies aimed at strengthening the competitiveness of African cotton, aid in the creation of a political and institutional environment encouraging the development of cotton, aid in the introduction of technological innovations, improvement of cotton price fluctuation risk management mechanisms and the development of a regional integration strategy for the chain. During a visit to Bamako in April 2005, Peter Mandelson, the European Commissioner in charge of the dossier, spoke in favour of concrete, rapid measures to support West African cotton producing countries. He announced an exceptional EUR 310 million in development aid for the four African countries most affected by the fall in cotton prices, while denying the impact of decoupled European aid on the price of cotton. It were as if Europe knew that it had to make a gesture in favour of African producers but that it had gone most of the way by partially decoupling aid, and that it was now up to the USA to act.

The United States will have to revise at least some aspects of their cotton support policy following the dispute with Brazil. It is presenting this concession as being part of the ongoing negotiation and clearly does not wish to go any further, especially in the approach to an election year, except within the framework of overall negotiation that would give it satisfaction with regard to a number of subjects that are dear to it.

The other groups (especially the Cairns Group, grouping the emerging countries that export agricultural products, the ACP countries and China) showed their support for the African position, without being in the front line at this stage of the negotiations. ■

6 – Conclusion

The prospects of a rapid agreement on the elimination of subsidies and giving satisfaction to the African countries are hardly encouraging in the present state of negotiations (October 2005). Two considerations emerge in the face of this risk of failure:

- on the one hand, the subsidies awarded by certain countries to their cotton production sectors are partially responsible for the present cotton slump, and their elimination would lead in the short term to a firming of prices. However, it is not certain that this would result in a lasting price recovery to the levels of the previous decades, given the technical progress made and the pressure from certain producers, who will not fail to benefit from the reduction in US and EU production;
- on the other hand, African cotton production, resulting from an undeniable historical success, now displays disturbing signs of fragility and loss of competitiveness resulting from structural factors over and above the present economic slump. **These structural weaknesses (inadequate re-**

search, infrastructure, institutional environment, etc.) can only be overcome with substantial investment. Now, the present financial situation of the African cotton sectors and states makes this impossible without massive external aid. This support seems totally justified, given the economic and social importance of cotton in the main African producer countries.

These considerations confirm the validity of the twofold African request (elimination of subsidies and financial aid). They also highlight the importance of the need for support, which should not be merely designed for the present slump but also enable the African sectors to restore their competitiveness. In case of delay in the handling of the question of subsidies, it would doubtless be **opportune to seek immediate, substantial progress in that of support and aid for development.** No large-scale concrete solution to these problems has yet been put forward, while it is difficult to understand the possible reasons for such a blockage. ■

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At the Conference:

'Hong Kong –15 Farmers Take the Floor'
Paris, 30 November and 1 December 2005

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