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"Development Box" and Special and Differential Treatment for Food Security of Developing Countries: Potentials, Limitations and Implementation Issues

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Contents

List of Tables

List of Figures

List of Abbreviations

ACP	African, Caribbean and Pacific Group of States
AoA	Agreement on Agriculture
DB	Development Box
ERS	Economic Research Service
FAO	Food and Agriculture Organization
FSB	Food Security Box
GATT	The General Agreement on Tariffs and Trade
GDP	Gross Domestic Product
GSP	Generalized System of Preferences
GTAP	Global Trade Analysis Project
IFAD	The International Fund for Agricultural Development
IMF	International Monetary Fund
LDC	Less developed country
MEDA	Mediterranean European Development Agreement
NTB	Non-tariff barrier to trade
OECD	Organization for Economic Co-operation and Development
PRSP	National Poverty Reduction Strategy Paper
SDT	Special and Differential Treatment
SPS	Sanitary and Phytosanitary Measures
TRIPS	Trade-related aspects of intellectual property rights
WFP	World Food Programme
WTO	World Trade Organization

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Abstract

At the Ministerial Conference in Doha, WTO member countries acknowledged the need to further correct the prevailing restrictions and distortions in agricultural world markets. The Ministerial Declaration of Doha reaffirms the commitment of creating a fair agricultural trading system that will recognize the special needs of developing countries and foster their full integration and participation in agricultural world trade. It has been widely discussed who the winners and losers of further trade liberalization may be, considering particular country groups such as the Cairns Group or the group of Net Food Importing Developing Countries. Although many developing countries may gain from both increased access to OECD markets and the elimination of own trade barriers, the most vulnerable economies within the international trading system are likely to be left behind. Therefore, it has been argued that the current WTO negotiations have to be held under the motto of a "development round" and multiple proposals have been made towards the creation of a *Development Box*. In this context, our paper emphasizes the heterogeneity of developing countries as a group and the regional diversity within particular economies and puts a special focus on people rather than countries. We suggest a conceptual design of a potential Development and Food Security Box within the WTO Agreement on Agriculture that would address the most pressing issues of hunger and poverty in food-insecure, low-income countries/regions. We also suggest conceptual measures to further integrate the poorest of the poor into the existing trading system and to stimulate their economic development. Finally, we make a first attempt to identify possible actors as well as financing and implementation mechanisms for a viable Development Box that would reach beyond conventional Green Box and Special and Differential Treatment measures. We conclude that direct action for food security remains necessary. The complementary potentials of trade, finance, and political reform, and the multiplicity of instruments needed for sustainable development, including food security, are to be utilized. *A rule-based Development Box that is complementary to trade liberalization in the long run is called for.*

Kurzfassung

Auf der Ministerkonferenz in Doha bestätigten die WTO-Mitgliedsländer, dass es dringend notwendig ist, bestehende Restriktionen und Verzerrungen auf den Weltagrarmärkten zu korrigieren. Die Erklärung der Ministerkonferenz verpflichtet die WTO-Mitgliedsländer abermals, ein faires Agrarhandelssystem zu unterstützen, welches die besonderen Bedürfnisse der Entwicklungsländer berücksichtigt und ihre volle Integration und Teilnahme am Weltagrarhandel fördert. Es wurde intensiv diskutiert, wer die Gewinner und Verlierer einer weiteren

Handelsliberalisierung sein würden; dabei wurden spezielle Ländergruppen wie die Cairns-Gruppe oder die nettonahrungsmittelimportierenden Entwicklungsländer betrachtet. Obwohl viele Entwicklungsländer sowohl von dem verbesserten Zugang zu den OECD-Märkten, als auch von der Eliminierung der eigenen Handelsbarrieren zu profitieren scheinen, werden die verwundbarsten Länder zunehmend marginalisiert. Daher soll die laufende Welthandelsrunde eine „Entwicklungsrunde“ sein, in deren Zusammenhang verschiedene Vorschläge für die Erstellung einer Entwicklungsbox gemacht wurden. Dieser Diskussionsbeitrag betont die Heterogenität der Entwicklungsländer und die regionale Diversität in den einzelnen Ländern und ist auf die Bevölkerung statt auf Länder fokussiert. Wir schlagen ein konzeptionelles Design einer potenziellen Entwicklungs- und Nahrungsmittelsicherheitsbox innerhalb des WTO-Agrarabkommens vor, welche die dringlichsten Aspekte von Hunger und Armut in Ländern/Regionen mit Nahrungsmittelunsicherheit und niedrigen Einkommen berücksichtigt. Darüber hinaus schlagen wir konzeptionelle Maßnahmen vor, die die Ärmsten unter den Armen besser in das existierende Handelssystem integrieren und ihre ökonomische Entwicklung stimulieren. Dazu werden in einem ersten Versuch sowohl mögliche Akteure, als auch Finanz- und Implementierungsmechanismen für eine nachhaltig wirkende Entwicklungsbox identifiziert, welche über eine konventionelle ‚Green Box’ und die spezielle und besondere Behandlung der Entwicklungsländer hinausgeht. Wir halten fest, dass direkte Maßnahmen für die Nahrungsmittelsicherheit notwendig sind. Neben Handels-, Finanz- und politischen Reformen ist eine Vielzahl von Instrumenten, die für eine nachhaltige Entwicklung, einschließlich Nahrungsmittelsicherheit, notwendig sind, komplementär zu nutzen. Eine auf Regeln basierte Entwicklungsbox wird komplementär zur Handelsliberalisierung gefordert.

1 New Agenda Implied by Doha

In November 2001, the Ministerial Conference in Doha, Qatar, set new framework conditions with major implications for development policies. The negotiations and their results as stated in the Ministerial Declaration constitute the mandate for further negotiations of the Agreement on Agriculture (AoA). The negotiations shall be completed in January 2005, with progress being reviewed at the Fifth Ministerial Conference in Mexico, scheduled for 2003.[1]

Article 20 (d) of the AoA gives a clear mandate for further instruments that are suitable to address the commitment of creating a fair agricultural trading system that will recognize the special needs of developing countries and foster their full integration and participation in agricultural world trade. Thus, current restrictions and distortions of the agricultural world markets shall be corrected. Besides its commitment to fundamental reforms "in order to correct and prevent restrictions and distortions in world agricultural markets", Paragraph 13 (Agriculture) of the Doha Declaration specifies that "Special and Differential Treatment (SDT) for developing countries shall be an integral part of all elements of the negotiations". This shall allow for the development needs of developing countries, i.e. food security and rural development.

While there is increased consensus that the current trade round should be much concerned with development (a "development round"), the precise meaning for its goals and instruments is yet to be defined. In order to become meaningful, more coherence between trade policies and other international and domestic policies relevant for development must be called for (i.e. institutional reform, governance, development finance, technology policies). Thus development-oriented trade policy leads to a much broader and more complex agenda. At the same time the content of a "Development Box" (DB)—and as part of that, a "Food Security Box" (FSB)—must be defined. Poor countries' and poor people's resource constraints and opportunities for wealth creation among them form the basis of the suitable content of these "Boxes".

A Development Box may address a much larger set of issues reaching far beyond agriculture, including, for instance, property rights and services. Still, due to their key roles for food security, rural development, and poverty reduction, trade-related policies in food and agriculture are highly relevant for the "development round". Addressing these issues largely from a developing countries' perspective, we first review the state of trade-related agricultural policies in developing countries and recent findings regarding expected general agricultural liberalization. We then discuss the deficiencies in the implementation of the WTO AoA, and finally assess elements and options for

[1] WTO web site at http://www.wto.org/english/tratop_e/dda_e/dda_e.htm accessed on April 29, 2002.

special and differential treatment, as well as a Development Box and its potential food security components.

We conclude that the global trade system for agriculture is at a cross way, where one possible pathway leads towards a dangerous erosion of rule-based trade that would be detrimental for developing countries, and where the other pathway leads towards a heavy overloading of trade policy with objectives it hardly can handle. We make an attempt to identify scope and limitations to walk this second pathway, which includes making a Development Box rule-based.

2 Agricultural Policies and Foreign Trade of Developing Countries

Trading with agricultural products is of great importance to developing countries. Out of US$558 billion in total agricultural world trade, developing countries accounted for about 40% in 2000 (WTO 2001). Some examples show the dependence of developing countries from their agricultural exports: In 1999, agricultural products accounted for 97% of all exports in Ethiopia, 80% in Malawi, 77% in the Ivory Coast, 70% in Uruguay, and 49% in Argentina.

Many developing countries have put their agricultural sectors into a disadvantageous situation by promoting and subsidizing the industrial sector and taxing the agricultural sector. As a consumer of industrial inputs, the agricultural sector is faced with high input prices. Import substitution in the industrial sector has the effect of a high tax in agricultural production and exports, resulting in a negative protection. In addition, the efficiency of the agricultural markets is highly disrupted through various market and policy failures.

However, the developing countries are a very heterogeneous group. Two third (105) of the 148 developing countries that are members of the WTO are net food-importers, while two fifth (63) are net exporters of agricultural products, including 33 low-income countries of which only a few are significant net exporters of food products (McCalla 2001). Srinivasan (1998) stresses that developing countries are also heterogeneous in terms of their institutional and economic development. This matters in realizing benefits from trade liberalization. For a country with poor infrastructure that is focused on subsistence production, the liberalization of trade with agricultural products may not matter much. For an advanced developing country with a well-developed infrastructure and functioning institutions, however, trade liberalization can lead to major gains.

The infrastructure in many developing countries is insufficient and high transaction costs impede the export from Africa significantly. For one third of all African countries transport cost and insurance payments account for more than 25% of the total value of exports—for Uganda, for example, they even exceed 70%. However, these high costs partly arise from domestic policies and not necessarily from great distances. There are indications that the less competition-oriented cargo reservation policies in most African countries negatively impact on the freight costs (Yeats et al. 1997). Also, landlocked countries, such as Uganda, partly depend on the trade-related infrastructure of their neighbors. In the African countries mentioned above the agricultural exports often consist of only a few products, sometimes just one. In most cases, these are tropical products, which do not compete with products from developed countries. Their imports to developed countries are often subject to low tariffs (even zero tariffs in the case of the least developing countries). However, processed tropical products face tariff escalation, thus impeding potential growth opportunities in

developing countries. Combined with the protection of agricultural inputs, this still leads to major impediments for the establishment of processing industries in developing countries. In addition, the prices of tropical products show a huge fluctuation on the world market. Exports from Latin American countries are more diversified and partly compete with products of the developed countries. Depending on the composition of these exports, different effects can be expected from the liberalization of the agricultural markets.

Meilke (2000) found that liberalizing and outward-oriented countries grow, compared with non-globalizing countries. He further notes that they have invested early on and heavily in rural development and the improvement of agricultural productivity. This view is supported by Dollar and Kraay (2000) who identified eighteen developing countries that have had large tariff reductions and large increases in actual trade volumes since 1980. They show that the liberalizing developing countries are catching up with rich countries while the non-liberalizers fall further behind. They also show that expanded trade usually translates into proportionate increases in income of the poor. They support the view that open trade regimes lead to faster growth and poverty reduction in poor countries. Given general weaknesses in up to date poverty measurement and its multiple dimensions the jury is still out on this critical issue.

While many Asian (Korea, Malaysia, Thailand, and Indonesia) and Latin American countries opened their markets in the 1980s an 1990s, most African countries proceeded with their inward-oriented protectionist policies and, therefore, grew only a little (McCalla 2001; Meilke 2000). However, in the late 1980s and early 1990s, many African countries have started to undertake policy reforms, either in the context of structural adjustment programs or in order to be able to implement regional trade agreements (FAO 1997). Nevertheless, the agricultural sector in most developing African countries remains underdeveloped.

The reluctance of some developing countries to participate in the liberalization process is based on their concern that no fair, open, transparent international trading environment will be created by WTO. They are worried about losing or getting only restricted access to new markets. Therefore, they ask for substantial reductions in agricultural tariffs in developed countries; end of agricultural export subsidies; reduced domestic support in developed countries; a fair implementation of WTO agreements; more technical and financial assistance to be able to implement the legal and technical trade rules; acceptance of measures that promote the production for the domestic market; and assurance that food security will be excluded from reduction obligations, even if they have trade-distorting effects. They suggest that the special rights of developing countries should be summarized in a food security and development box.

3 Expected Impacts of General Liberalization

3.1 Huge total transfers

The heavily subsidized agricultural policies of most developed countries tend to distort world agricultural trade patterns by inhibiting needed investments in developing countries agriculture, and limiting the access to their markets, thus depressing returns to developing countries (OECD 1997). In 1999, total support to agriculture reached an estimated US$356 billion, or 1.4% of GDP for the OECD as a whole (OECD 2000). Average bound tariffs on agricultural products are still over 40%, compared to 4% for manufactures. Estimates of total support to agriculture in OECD countries are presented in Table 1 (OECD 2001). There was a significant absolute increase in OECD support to agriculture from the period 1986-88 to 1998-2000, but a relative decrease in terms of percentage of GDP from 2.2 to 1.3%.

It is often misunderstood, that all of this "total support" of US$356 million would be in principle available for something else (e.g. development cooperation) when protectionism were to be stopped. By no means is that true, as much of the total support comprises of transfers between consumers and producers in OECD countries.

Table 1: Estimates of OECD support to agriculture (US$ million)

	1986-1988	1998-2000	1998	1999	2000p
Total value of production (at farm gate)	559,152	651,004	668,305	653,148	631,558
Total value of consumption (at farm gate)	528,482	597,978	605,437	600,153	588,344
Producer Support Estimate (PSE)	236,445	257,567	253,661	273,552	245,487
Percentage PSE	38.7	34.9	33.7	36.7	34.2
General Services Support Estimate (GSSE)	41,601	57,137	58,907	56,981	55,522
GSSE as a share of TSE (%)	13.9	16.8	17.4	16.0	17.0
Consumer Support Estimate (CSE)	-166,892	-158,430	-156,485	-171,719	-147,085
Percentage CSE	-33.0	-27.7	-27.0	-29.9	-26.1
Total Support Estimate (TSE)	**298,480**	**340,544**	**339,065**	**355,927**	**326,640**
Percentage TSE (as share of GDP)	**2.2**	**1.3**	**1.4**	**1.4**	**1.3**

Note: TSE is an indicator of the annual monetary value of all gross transfers from taxpayers and consumers arising from policy measures which support agriculture, net of the associated budgetary receipts, regardless of their objectives and impact on farm production and income, or consumption of farm products.
Source: Adopted from Table III.1. in OECD (2001).

3.2 Welfare Gains

A number of studies seek to estimate potential real gains for developed and developing countries stemming from global liberalization as well as to identify potential losers. The potential net gains are significant. Most recent studies that address trade liberalization issues at the global level apply the Global Trade Analysis Project (GTAP) database.[2] The GTAP database is the most comprehensive worldwide economic database with a trade focus that explicitly addresses the issues of protection and support. Using the GTAP database, Anderson et al. (2001) estimate the cost that occur to developing countries from their own protection as well as from persisting protection levels in developed countries after the full implementation of the Uruguay Round agreement. Analyzing full global liberalization, the study shows that US$65 billion per year or 60% of total cost to developing countries from prevailing post-Uruguay protection arises from own protection measures, while US$43 billion per year or 40% is due to barriers to market access in developed countries. Hence, there would be great benefits to developing countries from a round of trade negotiations that reduced barriers in both North and South. The results obtained by Anderson et al. (2001) are within a broad range of comparable model-based estimates concerning post-Uruguay Round trade liberalization, which have been reviewed in a literature survey by the World Bank (2001). All these estimates increase substantially when going dynamic by adding a productivity term estimated from the relationship between openness and growth.

The Economic Research Service (ERS) at the U.S. Department of Agriculture (2001) assesses the costs of global agricultural distortions and the potential benefits of their full elimination. The key findings of this study are as follows:

- Full elimination of global agricultural policy distortions would result in an annual world welfare gain of US$56 billion.
- Elimination of agricultural trade and domestic policy distortions could raise world agricultural prices by about 12%.[3]
- Tariff and tariff rate quotas account for more market distortions (52%) than domestic subsidies (31%) and export subsidies (13%).[4] Post-UR agricultural tariffs remain high at a global average rate of 62 % and an industrial country average of 45%.
- In emerging and developing countries, global policy reform will lead to increased agricultural exports and improved terms of trade.
- Most of the potential benefits to emerging and developing countries of US$21 billion annually will come from developing countries' reform of their own policies.

[2] The GTAP database is hosted at Purdue University (www.gtap.org). It currently contains 66 regions and 57 sectors (GTAP Version 5).

[3] EU agricultural policies account for 38% of global price distortions, Japanese and Korean policies combined for 12%, and U.S. policies for 16%.

[4] The remaining 4% measure interaction effects of the three policies combined.

- Low-income countries' food aid needs will decline by 6% as their domestic food production expands in response to higher world prices.

Diao et al. (2002) analyze the cost of agricultural protection in the North to developing countries and find:

- A more open EU market (the largest market for many developing countries' agricultural exports) is in the common interest of most developing countries. If 10% of intra-EU agricultural trade were replaced by imports from developing countries, it would create export opportunities equivalent to 9% of total developing countries' agricultural exports in 1998. However, for some African countries that highly depend on the export of a narrow group of commodities—such as tobacco leaves and coffee beans—a more liberalized world market may not create more export opportunities.

- The current level of world prices for agriculture is 8-10% below the level if all protection policies in the North were removed. Higher agricultural world prices would increase the ratio of food imports over domestic total consumption and decrease the ratio of total exports over food imports for many net food-importing developing countries and thus have a negative effect on their food security. However, post-reform domestic food production also increases.

3.3 Distributional Effects and Poor People

Impacts of trade liberalization on the poor result from price effects, employment and business competition effects, as well as from fiscal effects (which may impinge on social spending). The total of these effects is difficult to estimate in comprehensive ways, including dynamic changes. Hertel et al. (2001) recognize the deficiencies of most global trade liberalization studies when it comes to a differentiated impact assessment. On the one hand, poverty studies that apply detailed household survey data typically focus on an individual country only, while on the other hand, global studies that incorporate different countries or regions produce national averages only. Analyzing a multilateral trade liberalization scenario (the complete elimination of merchandized tariff barriers as well as textile and apparel quotas), the authors incorporate cross-sectional consumption data and income earnings data into their global trade analysis framework. In each of their five focus countries (Brazil, Indonesia, Philippines, Thailand, and Zambia), Hertel and his co-authors distinguish five population strata according to their main source of income.[5] Their differentiated analysis reveals that at an aggregate level, multilateral trade liberalization reduces

[5] (1) Households relying almost exclusively (>95%) on transfers; (2) self-employed households specializing in agriculture; (3) self-employed households specializing in non-agriculture; (4) households specializing in wages/salaries; and (5) diversified households that get less than 95% of their income from each of the four previous sources.

poverty in three countries (Brazil, Indonesia, and Zambia) and seems particularly favorable for self-employed households specialized in agriculture. However, self-employed households specialized in non-agriculture in Brazil and Zambia, as well as wage-earning households in Brazil suffer from increasing poverty levels. Hence, this study calls for caution when making general statements on the impact of global trade liberalization on developing countries' welfare. Different countries are not only affected to different degrees (or even contrary), but also different societal groups within a country are affected differently and possibly directly opposed.

Taking the analytical evidence into account, one can conclude that global liberalization would (a) generate substantial benefits for developing countries in the magnitude of about US$50-60 billion annually, (b) increase world prices for agricultural products by around 10%, and (c) create sizable export opportunities to developing countries through both trade diversion and trade creation. However, the gains will be distributed diversely across countries and also across different population groups within countries, and some population groups would lose as consumers (due to price effects), as wage earners (due to employment effects), and/or as farmers (due to output and input price effects and trade-related technology access).

4 Deficiencies in Implementation of the WTO Agreement on Agriculture

So far, the impact of the Uruguay AoA has been limited (Hathaway and Ingco 1996). Agricultural sectors that are highly subsidized (such as meat, milk, and sugar) were not or hardly liberalized. Sectors with low protection rates (such as fruits, vegetables, and oilseeds) were opened significantly more. There are still many traditional barriers and distortions concerning the trade with agricultural products resulting from trade policies and domestic support measures, and new ones were added. Also, the reform process is slow and often not transparent and as a consequence marginalizing the low-income countries. But it would be wrong to argue that there was no progress at all in development-oriented trade policy. In fact, the review of policies below will show that developing countries increasingly use the WTO instruments of conflict resolution.

4.1 Tariffs and Tariff Rate Quotas

Even after implementation of the results of the Uruguay Round by 2005 and including the entry of Taiwan and China into the WTO, the extent of the distortions in the agricultural sector will exceed the distortions in other sectors. As a result of the transformation of non-tariff barriers (NTBs) into tariffs, the agricultural tariffs in developed countries will exceed tariffs for textiles and clothes, being the highest protected industrial branch, by two and a half times. In addition, there will be still production and export subsidies of 8%. As regards the level of the tariff rates in the developing countries, the actual tariff rates are much lower than the WTO-bound rates. This is true for the agricultural sector as well as the industrial sector. Therefore, there is enough room for tariff increases without conflicting with WTO rules.

Tariff rate quotas (TRQs) were included as an alternative instrument in the AoA of the Uruguay Round. Currently, 38 WTO member countries have a total of 1,379 TRQs. The objective of the TRQs is improved market access for some sensitive agricultural imports. Because of the tariffication of the NTBs, the tariff rates were relatively high in the base period (1986-88) and the obligation of the minimum market access was not always met. The newly introduced TRQs were supposed to allow countries to import up to their minimum market access obligations at zero or most favored tariff rates. For imports above these quotas, higher most favored tariff rates were set according to the principles of the market access requirements of the AoA. These most favored tariff rates are relatively high but in principle they do not restrict imports quantitatively. It was expected that the quotas would be filled by imports at the zero or low tariff rates (Abbott 2001). However, experience from the recent past has shown that TRQs have the effect of NTBs. There has been an

'underfill' of quotas (60%), meaning that the imports were lower than the quotas and that the minimum market access obligations have not been met. The insufficient implementation of the TRQs is partly based on the administrative requirements, the low transparency and the resulting high transaction costs for the exporters. As has been shown by the example of the banana market, indirect distribution and welfare effects occurred that were not conform to the desired goals. Furthermore, it is misleading to talk about a reduction of NTBs without considering the TRQs—as shown by Herrmann et al. (2000).

4.2 Export Subsidies and Taxes

The major problem with export subsidies is their use by high-income countries for agricultural commodities. This has a destabilizing effect on world market prices and distorts production markets in developing countries. Export subsidies continue to exist under the WTO AoA, although they were subject to reduction commitments. Since the majority of the developing countries did not use export subsidies when the agreement was concluded they were not allowed to use them in the future, while developed countries were allowed to maintain 64% of the base level of export subsidy outlays (Mamaty 2002).

Developing country members have become more constrained in the use of export subsidies but least developed countries and countries with per capita incomes below US$1,000 are permitted to use them. While they can stimulate exports, they may do so at a high cost to the budget. Their impact on the poor may be detrimental as they may result in rents to relatively rich exporters.

Developing countries often impose export taxes on commodity exports. In some cases, these are imposed for the extraction of minerals, in others they are used to exercise market power or to support local processing industries, often with an adverse impact on the poor. Export taxes result in a lower price for the farmers than the prevailing price in world markets for their commodities. Elimination of the tax will raise the income of poor farmers and reduce the profitability of the own processing facilities.

4.3 Antidumping and Conflicts

Antidumping is a trade policy measure that allows duties to be imposed on imports that are sold for less than what is charged in the exporters' home market so that price discrimination across the market can be offset. In practice, antidumping measures, if increasingly used, must be seen as protectionist measures allowed under WTO rules. The definition in the WTO documents is very weak. For example, it can be a normal profit-maximizing strategy of a firm to set different prices in different markets, which has nothing to do with discrimination. In addition, it is very difficult to calculate the dumping margins as there are different methods. Also for non-market economies it is

not the price in the home market but calculations of production costs that are used for comparison (Irwin 2002). Nevertheless, subsidized exports from the EU may lead to major market disruptions in the developing countries. The use of the "special protection clause" against these market disruptions by the developing countries is often prevented by the fact that this possibility is only given for products that have been taxed in the Uruguay Round and which are registered in a lst of products with special concessions. Only a few developing countries have made use of this clause so far. Others rely on the antidumping clause of the WTO according to which it has to be proved first that there is dumping and that a damage results from it. For developing countries, it is very difficult to prove the case of antidumping. In addition, many developing countries are in a difficult situation because they depend on a long-term basis on the imports of cheap foodstuff, especially grains. Thus, the terms of trade gains as a result of cheap food product prices may be perceived being higher than the losses based on the negative incentives for the domestic production.

In the 1980s, antidumping measures were mostly used by developed countries. Nowadays, more and more developing countries initiate antidumping measures to impose new import restrictions to other countries. Since the existence of the WTO in 1995 until the end of 2001, 806 antidumping cases were initiated by industrialized countries and 1,040 cases by developing countries; there were as many initiations from India as there were from the USA and the EU. Based on the trend towards the excessive use of antidumping measures by WTO member countries, there is the danger that it will work against an open trade system and that the pressure against liberalization is strengthened instead of weakened (Finger, Ng and Wangchuk 2001).

Table 2: Number and percentage of antidumping initiations by country groups January 1995 – December 2001

Against / *Initiated by*	Developed countries	Developing countries	Total
	Number of antidumping cases		
Developed countries	**231**	**575**	**806**
- USA	82	173	255
- EU	22	224	246
Developing countries [1)]	**360**	**674**	**1,040**
- India	98	150	248
- Argentina	41	126	167
- South Africa	72	80	156
Total	**597**	**1,249**	**1,846**
	Percentage of antidumping cases		
Developed countries	28	72	100
Developing countries [1)]	35	65	100
Total	**32**	**68**	**100**

1) Including transformation countries.

Source: WTO database at http://www.wto.org/english/tratop_e/adp_e/adp_e.htm accessed May 8, 2002.

About 5% of these cases refer to agricultural products and have evolved to WTO conflict cases. Since the beginning of WTO in 1995 until April 2002, a total of 243 conflict cases are registered. 91 of these or about 40% relate to agriculture. While developing countries have been the prosecuting party in 35 cases (incl. 19 against developed countries and 16 against developing countries), developed countries have been the prosecuting party in 56 cases (including 30 against developing countries and 26 against other developed countries). It is important to note that developing countries are increasingly using the conflict resolution mechanisms of WTO.

4.4 Food Safety, Standards and Non-tariff Barriers

Within trade between developing countries and developed countries, the safety of food is an issue of high political sensitiveness. High quality standards for food in developed countries can lead to market exclusion of products that do not meet these standards. Therefore, it is necessary for developing countries to meet the high standards of developed countries concerning their agricultural and food processing sector. Furthermore, it is necessary for developing countries to participate in the process of setting standards in international agricultural trade within the framework of the Codex Alimentarius.

Adoption of international standards implies high adaptation costs for developing countries. A World Bank study estimates that implementing just three of the Uruguay Round Agreements (on TRIPS, customs valuation, and SPS) could cost more than a year's development budget for the poorest countries (Finger and Schuler 1999).

Standards are not only very important in terms of food safety but they also reflect consumer preferences. Exaggerated standards run the risk of becoming an instrument of continuing protectionism, as they are non-tariff barriers to trade. Training, strengthening of capacities like laboratories, and capacity building in legal advisory services are important for the export trade of developing countries.

Art. 20 GATT holds legal insecurities since it allows trade restrictions as long as they are necessary for the protection of the lives of human beings, animals and plants, and as long as they are not used to discriminate. However, this article does not contain any criteria to assess this "necessity", so that it is hardly helpful to resolve related trade conflicts (Josling 2000). This lack of legal clarity could add to the pressure for developing countries as exporters to accept international standards set by developed countries regardless of their high costs.

Of course, developing countries are also allowed to introduce measures for consumer protection based on international rules. Usually, these standards are not as strict as in developed countries and they do not go beyond international norms (for instance the Codex Alimentarius). In

any case, products produced at lower standards similar to those of developing countries, which are not allowed for consumption in developed countries, should not be used as exports to developing countries.

4.5 Excessive Green Boxing

Developing countries cannot afford to implement expensive green box measures as shown in Table 3. They argue that the green box investments and transfers contribute partly to rural infrastructure and implicitly to lowering fixed cost of agriculture in rich countries and thereby undermine competitiveness of the developing countries.

Table 3: Total expenditure on Green Box measures by member; 1995 and 1999

Country	1995		1999	
	Amount in million US$	Share in reported Green Box expenditure of all members	Amount in million US$	Share in reported Green Box expenditure of all members
Grand total of reported expenditure	129,440	100	126,735	100
Total of reporting developed countries	110,173	85	110,958	88
Total of reporting developing countries	19,271	15	15,776	12
Total of reporting African countries	315	< 1	495	< 1

Source: Mamaty (2002).

4.6 Slow Pace of Reforms and Disappointing Special Regulations for Developing Countries

The reform process is as slow in industrialized countries as in developing countries. This is partly based on the special regulations for developing countries during the Uruguay Round. None of the 83 of the 95 reduction lists, which were submitted during the Uruguay Round by the developing countries for agricultural products, included any obligations to reduce domestic protection (IDS 1999).

Whether the exemption clauses of the Uruguay Round for developing countries—and among those for the least developing countries—are positive or negative is judged differently. Some

developing countries consider them as necessary and criticize that these clauses are too limited. The latter, however, is hardly possible because the industrialized countries push more and more towards reciprocity of the concessions. There are diverging positions among the developing countries and even within individual developing countries with respect to the strategy to be followed (Bjornskov and Lind 2002). This is not surprising since there are at least in the short run winners and losers with any strategy.

Overall, the AoA has opened significantly lower additional export and development opportunities for agricultural export-oriented developing countries than expected from the nominal reduction obligations. Even the special regulations that admit lower liberalization obligations and longer transition periods to developing countries do not promote agricultural development (Hauser 2001), because they sustain inefficient structures, prevent technological progress, and discourage investments in the agricultural sector.

The implementation of the Marrakech Declaration is one of the important requests of developing countries. Furthermore, there is the suggestion to raise a fund from which grants can be awarded in case of increasing import costs above predetermined thresholds. Another suggestion is to couple food aid with import costs. This suggestion gains plausibility because until now the food aid was always declining in case of rising world market prices, which became obvious at last between 1992/93 and 1996/97. For technical aid as being included in the Marrakech Declaration, a reliable implementation modus is needed.

5 Special and Differential Treatment and a "Development Box"

Paragraph 13 (Agriculture) of the Doha Declaration specifies that "SDT for developing countries shall be an integral part of all elements of the negotiations and shall be embodied in the schedules of concessions and commitments and as appropriate in the rules and disciplines to be negotiated, so as to be operationally effective and to enable developing countries to effectively take account of their development needs, including food security and rural development." Furthermore, Paragraph 13 states "that non-trade concerns will be taken into account in the negotiations as provided for in the Agreement on Agriculture."

In addition, Paragraph 44 (SDT) of the Doha Declaration reaffirms "that provisions for SDT are an integral part of the WTO Agreements" and acknowledges "the concerns expressed regarding their operation in addressing specific constraints faced by developing countries, particularly least developed countries." Paragraph 44 recognizes the proposed Framework Agreement on SDT (WT/GC/W/442) by 12 member countries and agrees "that all SDT provisions shall be reviewed with a view to strengthening them and making them more precise, effective and operational."

Since the Seattle Ministerial Conference, the idea of a Development Box has been on the table for discussion. The idea is basically to allow developing countries more flexibility in implementing the AoA. In the run-up to the Ministerial Conference in Doha several member country coalitions submitted negotiating proposals concerning the SDT and Development Box issue. An early proposal on "SDT and a Development Box" (G/AG/NG/W/13 from 23 June 2000) was submitted by 11 developing countries, recommending aims and instruments of such a box. However, this proposal was not adopted in the Doha Declaration. Instead, the above-mentioned proposal on a Framework Agreement on SDT (WT/GC/W/442 from 19 September 2001) finds explicitly recognition in the Declaration.

Besides the official proposals made by different member country coalitions, we find proposals by a number of international development organizations. The FAO, for example, suggests within its catalog of "Measures to enhance agricultural development, trade and food security in the context of the WTO negotiations" several clarifications, interpretations, and adjustments to the current provisions of the AoA (with respect to domestic agricultural production) that can be taken as a guide for the creation of a Development Box.[6] Another example is the Catholic Agency for Overseas Development (CAFOD) in the U.K. that offers an extensive proposal on Development Box instruments including market access and domestic support measures, aiming at (a) developing

[6] FAO web site at http://www.fao.org/docrep/003/x4829e/x4829e06.htm accessed on April 29, 2002.

countries only, (b) enhance flexibility, (c) low-income, resource-poor farmers, and (d) food security.[7]

Nine developing countries[8] submitted an informal paper to the February 2002 special session on agricultural negotiations proposing the creation of a Development Box including measures to enhance food security and safeguard the livelihoods of rural communities. This proposal was only to be applied to developing countries and was designed to enhance flexibility rather than prescribe specific policies. It aims at

- protecting and enhancing their food production capacity, particularly in key staples,
- safeguarding employment opportunities for the rural poor, and
- protecting small/marginal farmers from 'an onslaught of cheap imports'.

One of the key elements of the proposal was to exempt basic food-security crops from reduction commitments.

Another paper from the same group proposed similar action under the special and differential treatment and asked for an exemption of staple food crops from reduction commitments and that developing countries should be able to reduce their bound rates by a smaller percentage than developed countries.

5.1 Changing Context and a Development Box in WTO

The conceptual design of a Development Box within the AoA should not start out as an attempt of creating just another colorful box of supportive measures, but to effectively integrate poverty reduction and development concerns into the WTO framework in a sustainable manner. "...the mercantilist economics that was satisfactory for the GATT is not adequate for the more complex policy instruments that the WTO now regulates … Decisions in the new areas should be structured as development/investment decisions—development issues to which a trade dimensions can be fitted, not the other way around" (Finger and Nogues 2001). The definition of a Development Box could support an adjustment process within the WTO from mercantilism to (development) economics.

Even under GATT, trade negotiations never followed pure economic interests. Uniting Europe against further wars and cold war considerations in the post-World War II era was more important to the key player United States than mere economic benefits from international trade (Finger and Nogues 2001; Gardner 1980). Given the political world order of the 21st century and

[7] CAFOD web site at www.cafod.org.uk/policy/devbox.htm accessed on April 29, 2002.
[8] Cuba, Dominican Republic, El Salvador, Honduras, Kenya, Nigeria, Pakistan, Sri Lanka and Zimbabwe (See Bridges, Feb. 2002, p.1).

consequential expanded needs for international arrangements, other pressing economic and political issues of worldwide interests must be considered. WTO's extensive membership predestines this organization as a most suitable forum to contribute to the wide scope of opportunities to address poverty reduction and development issues. A development dimension of the WTO would address both poverty reduction and development in the neediest countries, as well as growth and trade concerns of developed countries.

While the new large members of WTO (i.e. China with its small-farmer adjustment problems) will increasingly matter, EU and US policies will continue to play important roles in the context of WTO agricultural trade negotiations and the Development Box. Most EU countries have special relationships with a large number of developing countries. Therefore, the EU shows particular interest and engagement with respect to development issues such as extended regional preferences (ACP and MEDA arrangements) and the Generalized System of Preferences (GSP), including the recently adopted "Everything-But-Arms" initiative. However, these conventional policies and instruments are neither appropriate nor sufficient to address the prevailing and persistent deficiencies in hunger-struck, low-income economies in the long run. They are largely unilaterally reversible, do not address supply side constraints, and rules of origin impose further obstacles. With respect to WTO and developing countries the EU builds on SDT, signaling that the EU is prepared to accommodate concerns of developing countries on food security, rural development, and rural poverty by adjusting the Green Box, and by increasing the threshold for *de minimis* support in developing countries (Moehler 2001). The US extension of a free trade zone to Latin America might have facilitated more market access for farmers from that region, but at the same time, the USA have recently expanded their domestic support for agriculture to an unprecedented scale (the 2002 Farm Bill of US$73.5 billion expands subsidies by more than 70%), thus undermining the US role in multilateral and possibly regional trade negotiations.

5.2 Contents of a Development Box

Eligibility for participation in a Development Box is an important issue because not only the member countries that will benefit from its establishment will be determined, but also actual measures the box will contain. Developing countries are not only large in number, but also extremely diverse with respect to their resource endowment, level of development, degree of integration into the world economy, and—first and foremost—with respect to their current poverty and food security situation. Diaz-Bonilla et al. (2000) perform a cluster analysis to categorize developing countries according to five food security criteria, (i) food production per capita, (ii) the ratio of total exports to food imports, (iii) calories per capita, (iv) protein per capita, and (v) the share of the non-agricultural population share. Diaz-Bonilla et al. (2002) conclude: "the AoA text may require added language to clarify and extend its provisions about food security concerns, along with a better definition of groups of countries based on objective indicators of food insecurity."

Grouping countries by different criteria in order to generate homogenous groups (such as cluster analysis) reveals the limits of the commonly adopted country group concept. Further WTO negotiations (particularly within the AoA) have to focus on people rather than countries or groups of countries. Not only do we observe severe fluctuations across regions and districts of single countries, but also across population groups in the same regional location. A group of particular interest in the context of designing a Development Box are low-income, resource-poor farmers, who need special attention to address national food security problems through (a) their own self-reliance and (b) the utilization of potential excess production for enhanced food supply in rural areas.

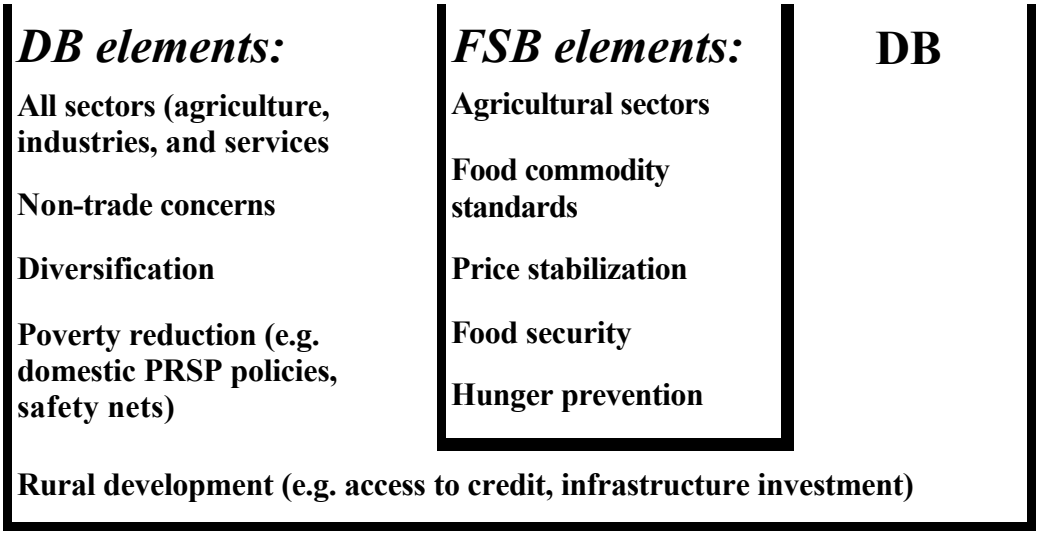
In this context, the WTO concept of food security needs to be defined precisely and to be distinguished from the concept of food self-sufficiency. The broadly accepted definition by the World Food Summit should be guiding food security concerns under WTO as well: "Food security exists, when all people, at all times, have physical and economic access to sufficient, safe, and nutritious food to meet their dietary needs and food preferences for an active and healthy life" (FAO 1996, p.3).

The ongoing WTO negotiations on agriculture need to explicitly define a new package of provisions aiming at the above mentioned needs of the most disadvantaged economies and people. It would be insufficient to simply redefine the existing tools of SDT and Green Box in order to address the insufficient differential treatment of developing countries under the Uruguay Round to date. New and innovative action within the WTO is required to confront all stakeholders with the immense challenges of fully integrating developing countries into the world economy and the world trade system.

Developed countries should not seek the opportunity to take advantage of these particular negotiations by incorporating counter-proposals on 'multifunctionality' or further expansions of the current Green Box regulations. The merging of Development Box issues with developed countries' interests such as 'multifunctionality' could denote the end of rule-based trade within WTO. Alterations of existing instruments under the AoA should be negotiated largely independently of a Development Box to guarantee its effectiveness with respect to eligible target groups and potential measures.

If properly designed, a Development Box may offer a broad range of opportunities. In general, a Development Box should comprise of different sub-sections that address needs at different economic and social development levels. It seems indisputable that temporary and permanent hunger in food-insecure countries needs to be challenged by a newly created Development Box. Furthermore, broader food security issues, poverty, rural development, and economic growth of countries that are eligible under the Development Box have to be addressed. Hence, we acknowledge that a "Food Security Box" may be defined as a sub-section of a Development Box but that the entire scope of a Development Box goes beyond food security issues (see Figure 1).

Figure 1: Food Security Box (FSB) as part of a Development Box (DB)



Apart from such general considerations with respect to food security and development, other interests of the most disadvantaged developing countries have to be addressed in a Development Box:

- Trade reform measures need to be pro-poor and conform to national poverty reduction programs. Domestic safety nets may be designed as complementary measures to trade liberalization to ensure their pro-poor character.
- Inappropriate measures under existing WTO regulations, e.g. TRQs (neutralizing Uruguay Round agreement), antidumping regulations that are applied excessively, and the tariff escalation problem need to be addressed.
- It will be important to prevent misuse of the DB in the sense that some developing countries with sufficient economic diversity and thus sufficient potential for development through domestic/national policies cannot take general advantage of DB preferences at the cost of particularly food-insecure other developing countries.

5.3 Food Security Elements in a Development Box

A Development Box should contain both food security and development elements. The DB should not be a set of emergency measures, but a well-defined package of measures that address the short-term food security needs as well as the long-term development goals of the poorest countries to facilitate their institutional and resource needs in a sustainable manner, serving (rural)

development and food security obligations that are stated throughout the AoA. Specific criteria and elements might include the following:

1) DB measures should only apply to a well-defined group of food-insecure countries, based on specified criteria. *Poverty and hunger indicators should determine eligibility*, not self-sufficiency concepts or other country averages. Thus, the DB should protect people, not commodities or countries.
2) *Complementarity of DB measures and other AoA measures* (e.g. commodity-specific free access to Quad markets if no export subsidies).
3) Permitted domestic support measures to *small-scale farmers* (based on specific criteria such as index of income or low-income, resource-poor concept), for instance linked to national Poverty Reduction Strategies (PRSPs).
4) Transfers permitted in case of large *price fluctuations* (stabilization, not permanent support of price levels). Financial and food aid support of trade-related domestic *safety net programs.*
5) Support of agricultural *productivity and diversification*, both for export and domestic production. Investment and input subsidies in the context of DB countries' development programs permitted under specific criteria.
6) Special and well-defined arrangements for DB countries with respect to *standards and consumer protection*, as well as environmental protection and assistance to reach appropriate standards.
7) *No fixed transition periods*, but linking duration of FSB measures to objective economic (e.g. level of development and human development index) and social (e.g. literacy and life expectancy) criteria.

5.4 Financing Development Box Measures

It would not fit the international division of labor if the FSB measures were linked to a special WTO financing mechanism. Rather existing mechanisms and coordinating bodies should be called upon, for example, the World Bank (linked to PRSPs), IMF, WFP, FAO, IFAD, etc. Still, incremental development finance will be needed for a FSB. Food security is not achievable soon without a cost. Part of the funding might be mobilized from a "dividend" of reduced OECD agricultural protection. However, such a "development dividend" from assumed full OECD liberalization would not amount to the current total support estimate level of US$356 billion (1999), because of (a) non-fiscal consumer-producer transfers and (b) persisting Green Box transfers that have obtained entitlement status. The fiscal protection cost that would be saved amount to about US$60-75 billion. In addition, according to the studies by Anderson et al. (2001) and the ERS (2001), developing countries would gain in welfare between US$12 and US$35 billion through OECD liberalization and full market access. On top of that, these studies calculate a gain from own

liberalization for developing countries of US$21 and US$31 billion.[9] According to these numbers, total gains to developing countries from a "development dividend" and welfare gains through global liberalization are likely to exceed US$100 billion annually (see Table 4).

Table 4: Annual dividends from end of protection and welfare gains (US$ billion)

Total agricultural OECD support	356
- Fiscal protection costs (potential "development dividend")	60-75
Welfare effects to LDCs from OECD liberalization	12-35
Welfare effects to LDCs from own liberalization	21-31
Total range of potential dividends and gains (annually)	93-141

Source: Derived from Table III.1 in OECD (2001), Anderson et al. (2001), and ERS (2001).

5.5 Participation and Actors

In order to truly expand the DB concept beyond the existing framework of SDT and box support measures, a broader participation of actors from the international development community seems desirable. The implementation of DB measures will be characterized though country-specific and individual treatments that require a high degree of country knowledge, insight, and ideally a functioning network for communication and distribution purposes. For example, an obvious candidate for inclusion when it comes to the access to food security goods would be WFP. Direct financial operations with farmers, for example, could be arranged through local micro-finance institutions and IFAD. In general, we need to acknowledge that in order to reach the poor, it will be necessary for the WTO to establish institutional frameworks that facilitate collaboration with institutions that are close to the poor and experienced in the country-specific context. Flexibility with actors is needed due to diversity of institutional capacities and food security problems.

5.6 Aiming for (Net) Gains

In the context of hunger prevention and poverty reduction it is obvious that primarily we cannot expect a (financial) "positive rate of return" in a cost-benefit scenario. Moreover, costs, on the one hand, and benefits, on the other, will occur to different actors (developed and developing countries) and thus cannot be balanced with each other in a meaningful manner. However, we try to

[9] Note that due to the comparative static nature of the analyses the actual welfare gains from liberalization may be underestimated. As mentioned earlier, the dynamization of these analyses reveals further welfare gains.

provide some qualitative indication where and to what extent costs and benefits may occur within the DB framework discussed and where the links as well as the trade-offs may lay.

- Benefits for DB countries
  - Measures that end/prevent hunger and reduce poverty will have permanent and cumulative benefits in terms of (a) increasing social individual welfare, (b) increasing productivity, and (c) decreasing consequential costs related to hunger and poverty.
  - Hence, food-insecure and poor countries will gradually be able to rely more on their own production capacities, increase their domestic financial capacities, and subsequently rely less on foreign-financed emergency aid and other support.
- Costs for developed countries
  - Increased development finance for rural development, agricultural growth, and productivity enhancement.
  - Lost profits in own domestic markets in case of free market access for DB countries' (subsidized) products and subsequent crowding out effects.
- Benefits for developed countries
  - Growing markets in developing countries for developed countries' product, including agricultural and processed food in the long run.
  - The existing food aid system could be reduced to a pure emergency system in the long run.
  - Reduced balance of payment support through international organizations such as the IMF and reduced need for further debt rescheduling/forgiveness.

5.7 Strategic Directions: A Rule-based Development Box

Access to trade opportunities facilitates social and economic human rights[10] and thus is an ethical issue of people in an integrating world economy, not just a matter of technical rules of give and take between negotiating nations. A Development Box is to be measured against such rights and ethical principles, but it must not be overstretched.

Rule-based trade must be "protected" as a global public good in the interest of the poor, as it mitigates against rent seeking by the rich and powerful. It must not be undermined by excessive special and differential treatment or by trading an ill-defined DB (including a FSB) against an ever-growing Green Box. In general, the bigger chances for developing countries are to be found by focusing on mutual liberalization at multilateral level and not by further pushing special and differential treatment.

It remains a broad development and food policy agenda for developing countries to ensure food security in the future, not just an adjusted trade agenda with a FSB. Overburdening the trade agenda with the development and food security agenda may backfire against the poor. Direct action for food security remains necessary. The complementary potentials of trade-, financial, and political reform, and the multiplicity of instruments needed for sustainable development, including food security are to be utilized.

A rule-based DB that is complementary to trade liberalization in the long run is called for.

[10] Art. 25 and 28 of the Universal Declaration of Human Rights: "everyone has the right to a standard of living adequate for the health and well-being of himself and his family, including food" and "everyone is entitled to a social and international order in which the rights and freedoms set fourth in this Declaration can be fully realized".

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