

Nontariff Measures and Developing Countries

Has the Uruguay Round Levelled the Playing Field?

Patrick Low

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Trade liberalization measures agreed to in the Uruguay Round will dramatically reduce the incidence of nontariff measures limiting developing country exports. Safeguards and antidumping instruments are the likeliest source of protectionist measures to counter the new liberalization.



Summary findings

In the policy environment prevailing before implementation of the Uruguay Round results, exports from developing countries face significant nontariff measures in industrial countries.

Based on 1992 trade flows, the import coverage ratio of nontariff measures on this trade was more than 18 percent, compared with less than 11 percent for trade among industrial countries.

Trade liberalization measures agreed to in the Uruguay Round will dramatically reduce the incidence of nontariff measures on developing country exports: the coverage ratio will drop to less than 4 percent on nonoil exports.

This change has the dual effect of increasing export market opportunities for developing countries and of substantially reducing — if not eradicating — the relatively negative bias against developing country exports.

These impressive results from the Uruguay Round are attributable to “tariffication” in agriculture, the abolition of the Multi-Fibre Arrangement (MFA), and the elimination of voluntary export restraints (VERs) under the safeguards agreement. But all these aspects of

liberalization will not happen instantaneously when the Uruguay Round results come into force. Agricultural tariffication will occur immediately, but the MFA will be phased out over ten years and VERs will be eliminated over four years.

Considering the extent of the liberalization presaged by these policy changes, Low and Yeats speculate about likely sources of pressure for measures to mitigate the effects of removing nontariff measures. They conclude that the greatest risks will probably come from safeguards and antidumping.

The new safeguards agreement permits the use of quantitative restrictions to stem the flow of injurious imports, and although the agreement tightens existing GATT rules in some respects, it loosens them in others.

The antidumping instrument has been used with increasing frequency by an increasing number of countries in the past two decades or more. The efforts of several governments in the Uruguay Round to impose additional controls on antidumping met with little success, and antidumping continues to offer considerable scope for imposing protectionist trade measures.

This paper—a product of the International Trade Division, International Economics Department—is part of a larger effort in the department to analyze and predict structural changes in trade and to quantify factors affecting developing countries' exports. Copies of the paper are available free from the World Bank, 1818 H Street NW, Washington, DC 20433. Please contact Jean Jacobson, room R2-055, extension 33710 (25 pages). August 1994.

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**Nontariff Measures and Developing Countries:
Has the Uruguay Round Leveled the Playing Field?**

by

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I. Introduction

It is often argued that OECD protectionism has an important restrictive effect on the exports and growth prospects of developing countries (see World Bank 1992, 1993). It has also been asserted that GATT's multilateral trade negotiation (MTN) process has not served developing countries as well as it has industrial nations. The fact that the Kennedy and Tokyo Rounds achieved considerably lower than average reductions in tariff barriers on products of major export interest to developing countries is cited as supporting evidence for this point (see UNCTAD 1968, 1982).¹ Related empirical studies also show that the structure and types of OECD tariffs often discriminate against developing countries. Specifically, developed countries' import duties generally increase or "escalate" with the level of a product's fabrication and this is thought to be an important constraint to processing of domestically produced commodities in developing countries (see UNCTAD 1968, Balassa 1968, Helleiner and Welwood 1978, or Yeats 1987).²

¹The Commonwealth Secretariat (1982, p. 29) noted "At the outset the Tokyo Declaration announced an intention to provide a better balance as between developed and developing countries in the sharing of the advantages resulting from the expansion of international trade The results did not live up to these ambitions and expectations. While average tariffs on industrial products were reduced by about one-third on an import weighted basis, the reduction for developing country products was only about one-quarter on base (protection) levels which were already significantly higher. The minimal progress made in liberalizing agricultural trade, and the fact that quantitative restrictions under VERs and OMAs were not considered, reduced the significance of the Round still further for developing countries."

²The types of tariffs applied are important. Specifically, Yeats (1976) found that developed countries often single out products in which developing countries have a comparative advantage and apply specific (i.e., fixed-charge-per-unit) duties to these items. Because unit values of shipments from developing countries are generally lower than those for similar tariff line level goods produced in industrial countries (due to production cost or quality differentials) specific tariffs were found to have nominal equivalents for the developing countries' products that were roughly double those for industrial countries.

Apart from tariffs, developing countries generally regard OECD nontariff measures (NTMs) as having an even more negative impact on their exports. The UNCTAD Secretariat (1993, p. 41) shows that nontariff measures imposed by industrial countries cover a much higher share of imports from developing countries than they do in respect of intra-OECD trade (see Table 1 for World Bank estimates). Almost one fifth of all non-fuel imports from developing countries are subject to NTMs in industrial country markets, while the corresponding share for trade among industrial countries is about one-tenth.

The purpose of this paper is to determine how far the Uruguay Round, when its results are fully implemented, will change the level, nature and incidence of OECD countries' NTMs on developing countries' exports. Preliminary information on what the Round accomplished suggests that a major change has occurred, yet little or no quantitative evidence has been produced thus far on the magnitude of the change. By utilizing a trade information system maintained by the World Bank and UNCTAD, this study attempts to estimate how the Uruguay Round will alter the profile of NTM protection facing developing countries, both in total and for regional groups of exporters. After an overall assessment of the findings, the study goes on to anticipate how OECD countries may attempt to neutralize or "claw back" the trade liberalization implied by the loss of NTM protection.

II. Nontariff Measures Facing Developing Countries

Utilizing World Bank-UNCTAD records on OECD trade barriers, Table 1 shows the share of these countries' imports from: (i) all industrial countries, and (ii) all other countries that encounter NTMs.³ The data show that OECD nontariff measures affect a notably higher share of imports from

³Laird and Yeats (1990, Chapter 4) provide a detailed description of how this inventory of nontariff measures was constructed and what its limitations are for research and policy studies. In particular, trade coverage ratios are a rough approximation of the importance of NTMs, in that they give no indication of the restrictiveness of the measures concerned. Low coverage ratios could be associated with highly restrictive NTMs, and vice-versa. The Laird and Yeats book also provides extensive empirical information on the results of NTM inventory studies for industrial countries. UNCTAD (1993, p. 37) tabulates the annual share of developing countries' exports that encountered nontariff measures over the last decade. The share of developing countries non-fuel exports covered by NTMs rose from 16.2 percent in 1981 to 18.3 percent in 1991.

Table 1. 1992 Nontariff Measure (NTM) Coverage Ratios for OECD Imports from Developed and Developing Countries.

Product Group (SITC)	1992 Imports (\$million)		NTM Coverage Ratios	
	Developing Countries	Industrial Countries	Developing Countries	Industrial Countries
ALL NON-FUEL ITEMS (0 to 9 - 3)	530,740	1,910,710	18.4	10.4
All Foods (0+1+22+4)	77,083	192,590	18.3	28.0
Food and Live Animals (0)	67,732	154,280	19.2	29.8
Oilseeds and Nuts (22)	2,502	5,856	9.8	4.2
Animal-Vegetable Oils (4)	2,829	5,081	7.8	8.3
Agricultural Materials (2-22-27-28)	20,076	53,580	10.9	5.0
Ores and Metals (27+28+67+68)	41,627	117,073	10.0	13.7
Ferrous Metals (67)	11,063	55,555	35.6	38.3
Non-ferrous Metals (68)	15,116	37,859	0.0	0.0
Mineral Fuels (3)	164,420	86,205	16.5	21.5
Chemicals (5)	21,806	216,939	3.4	5.9
Other Manufactures (6 to 8-67-68)	354,370	1,290,212	21.6	9.2
Leather (61)	3,741	5,013	56.5	29.6
Textile Yarn & Fabric (65)	18,375	50,651	52.1	9.0
Clothing (84)	75,293	47,615	64.3	7.0
Footwear (85)	15,844	12,163	34.0	16.8
ALL ITEMS (0 to 9)	695,160	1,966,916	18.0	10.9

Source: World Bank-UNCTAD SMART Database. Trade data from UN COMTRADE Records.

Notes:

(1). Trade and NTM coverage ratios are for the following markets: Australia, Austria, Canada, EEC(12), Finland, Japan, New Zealand, Norway, Sweden, Switzerland and the United States.

(2). The following types of measures have been included in the computation of the NTM trade coverage index: surcharges, variable levies, quantitative restrictions (including prohibitions, quotas, non-automatic licensing, "voluntary" export restraints and restraints under the MFA and similar textile arrangements, and state monopolies), price control measures (including minimum, reference or basic import price systems, price surveillance and voluntary export price restraints), additional customs formalities and other entry control measures, and local content requirements.

developing countries than they do imports from other industrial countries. Approximately 18 percent of developing countries' non-oil exports encounter NTMs, while the corresponding share for OECD intra-trade is about 10 percent. The statistics for several product groups reveal an even greater difference in developing-industrial country coverage ratios. Between 52 and 64 percent of developing countries' textiles and clothing exports face restrictions as compared to under 10 percent of OECD exports of these goods.⁴ Nontariff measure coverage ratios for developing countries' exports of leather and footwear are 17 to 27 points higher than shipments of these products from industrial countries. Voluntary export restraints and special import authorization procedures largely account for these coverage differences.

Table 1 shows that coverage ratios are not always higher for developing countries. In food items, for example, the coverage ratio for industrial countries is 28 percent, compared to 18 percent for developing countries. This is largely explained by the fact that tropical products, like coffee, tea and cocoa, accounting for approximately 15 percent of developing countries' food exports, face relatively few OECD nontariff measures. Most industrial country NTMs are applied to temperate zone food products (particularly grains and dairy products), which are mainly exported by other OECD countries.

Table 2 provides another perspective on nontariff protection facing developing countries by showing trade coverage ratios for different types of restrictions and by the product groups to which they are applied. Within foods and feeds, variable import levies are the most commonly applied restrictions, accounting for 52 percent of all NTM-covered trade in the group, followed by quantitative restrictions

⁴Estimates of the restrictive effect of NTMs in these sectors show the barriers are indeed formidable. The USITC (1989) estimated that the ad valorem equivalents of existing US NTMs on 54 broad categories of textile and clothing products ranged between 15 to over 100 percent. Laird and Yeats (1990) found that estimates for nominal equivalents of NTMs on grains, sugar, dairy, vegetable oils, poultry, pork oilseeds and nuts imported into the EU and Japan ranged from 50 to 300 percent and more. See also Saxon and Anderson (1982) and OECD (1987).

Table 2. Analysis of the Types and Relative Importance of OECD Nontariff Measures on Imports from Developing Countries.

Product Group (SITC)	1992 Imports from Developing Countries (\$bill.)	Trade Coverage Ratios ¹					
		All Nontariff Measures ²	Variable Levies and Surcharges	Quantitative Restrictions	"Voluntary" Export Restraints	Price Control Measures	Other Entry Control Measures
ALL NON-FUEL ITEMS (0 to 9 - 3)	530,740	18.4	1.9	2.2	12.4	1.5	2.3
All Foods (0+1+22+4)	77,083	18.3	9.6	5.4	2.1	3.1	2.4
Food and Live Animals (0)	67,732	19.2	10.6	5.2	2.4	3.3	2.6
Oilseeds and Nuts (22)	2,502	9.8	0.5	9.3	0.0	0.0	0.0
Animal-Vegetable Oils (4)	2,829	7.8	5.6	1.4	0.0	0.0	0.8
Agricultural Materials (2-22-27-28)	20,076	10.9	0.1	1.1	0.1	0.0	10.0
Ores and Metals (27+28+67+68)	41,627	10.0	0.1	0.5	5.5	6.5	0.0
Ferrous Metals (67)	11,063	35.6	0.0	1.0	20.2	23.6	0.0
Non-ferrous Metals (68)	15,116	0.0	0.0	0.0	0.0	0.0	0.0
Mineral Fuels (3)	164,420	16.5	2.4	14.1	0.0	0.0	0.0
Chemicals (5)	21,806	3.4	1.1	2.2	0.1	0.0	0.0
Other Manufactures (6 to 8-67-68)	354,370	21.6	0.4	1.7	18.3	0.5	2.1
Leather (61)	3,741	56.5	0.8	0.3	0.2	0.0	55.2
Textile Yarn & Fabric (65)	18,375	52.1	1.7	6.2	49.0	0.0	0.0
Clothing (84)	75,293	64.3	0.8	3.4	59.3	0.0	3.3
Footwear (85)	15,844	34.0	1.2	1.0	29.9	0.0	3.3
ALL ITEMS (0 to 9)	695,160	18.0	2.0	5.0	9.5	1.2	1.8

Source: World Bank-UNCTAD SMART Database. Trade statistics from UN COMTRADE records.

¹NTM groups are defined as follows. Variable levies and surcharges include all variable import levies (including variable components), product specific surcharges, minimum, reference, or basic import price regulations, price surveillance and "voluntary" export price restraints. Quantitative restrictions include prohibitions, quotas (global or country specific), state monopolies and non-automatic licensing requirements. "Voluntary" export restraints include measures under the MFA and similar textile quotas as well as other VERs (quantity) that were negotiated outside the textile and clothing sectors. Other entry control measures include a variety of restrictions like local content regulations.

²The coverage shares for the individual types of NTMs may sum to more than the "all NTM" coverage ratio due to "stacking" or the multiple application of NTMs on a specific product. Imports are for those OECD countries listed in the notes to Table 1.

(30 percent of covered trade), and other price control measures (like minimum import prices -- 17 percent of the total).⁵

Outside agriculture, "voluntary" export restraints (VERs) are among the most commonly applied restrictions facing developing countries due to their extensive application on textile and clothing products. Although the United States abolished quantitative restrictions on footwear in the mid-1980s, almost one-third of exports of footwear to the OECD are covered by NTMs, generally in the form of VERs (see Greenaway, 1985 for an analysis of the operation of VERs applied by the UK against Taiwan, China, and the Republic of Korea). Several entries in Table 2 also warrant clarification. The OECD coverage ratio of almost 17 percent for energy imports (SITC 3) from developing countries reflects Japan's global quotas on coal and tariff quotas on petroleum oils. In addition, the United States imposed product specific import charges on some petroleum products in 1987 which had the intention of equalizing domestic and international prices. Special entry regulations in the EU (including eco-labelling requirements) are applied to almost all leather imports including highly processed leather manufactures account for the 56 percent NTM coverage ratio for leather (see Varangis et. al. 1993 for an analysis of the effects of eco-labelling requirements on trade).

III. Accomplishments of the Uruguay Round

The foregoing discussion establishes two main points. First, in the pre-Uruguay Round policy environment, developing countries face significant NTMs in industrial country markets across a key range of sectors. Second, the incidence of these measures is considerably greater against developing country exports than against industrial country exports. The present section examines briefly how this situation

⁵Due to the multiple application or "stacking" of several NTMs on single tariff lines, trade coverage ratios for the different types of restrictions may sum to a larger total than that shown for all nontariff measures as a group. As an illustration US imports of cane sugar (tariff line 17011100) face three different nontariff measures: tariff quotas; flexible import fees (variable levies); and global quotas.

has changed as a result of commitments under the Uruguay Round, which should lead to a sharp reduction in the use of NTMs as an instrument of trade policy. The most relevant parts of the Uruguay Round results in this context are the agreements on agriculture, textiles and clothing, and safeguards.

Agriculture

After more than four decades during which the agricultural sector was excluded from mainstream GATT rules,⁶ the Uruguay Round achieved a major breakthrough. The agreement requires that participating governments do not "maintain, resort to, or revert to any measures of the kind which have been converted into ordinary customs duties."⁷ The measures to be so converted include virtually all nontariff measures. Specific mention is made of quantitative import restrictions, variable import levies, minimum import prices, discretionary import licensing, and nontariff measures maintained through state trading enterprises, and voluntary export restraints.

Nontariff measures are to be converted into ad valorem or specific tariffs as soon as the agreement enters into force. The resultant tariffs are to be "bound"⁸ and reduced gradually over a period of six years.⁹ The agreement includes a special safeguard measure, which allows an additional duty to be imposed on a product if its price falls or the volume of imports increases by a specified amount. Since the special safeguard is a price-based measure, its application would not raise the NTM coverage ratio.

The conversion of NTMs under the "tariffication" exercise is based on the actual difference between internal and external prices during the years 1986-88. The relevant calculations have been

⁶For a detailed discussion of how agriculture and textiles were excluded from GATT rules, and how safeguards disciplines became weaker over the years, see Low (1993).

⁷Article 4.2 of the Agreement on Agriculture.

⁸A tariff binding is the legally set maximum rate at which a tariff may be set. Actual tariffs can be below the bound rate, but cannot go above it unless the rate is renegotiated with trading partners.

⁹The period is extended to ten years for developing countries, and the least-developed countries are not required to make any reductions, although they are also prohibited from maintaining nontariff measures.

undertaken at the four-digit or six-digit level of the Harmonized System. Tariff equivalents for most processed products were not calculated from direct price comparisons, but in terms of the aggregate of component parts multiplied by their proportion in the product. Both the base year for the tariffication exercise and the manner in which the calculations are undertaken could lead to increases in the level of protection in the short-term, but any such increases would be dissipated by the tariff reduction commitments.¹⁰ In addition, tariffied products are subject to minimum or current access requirements,¹¹ which are to be guaranteed where necessary through tariff rate quotas. Reduction commitments have also been undertaken in respect of domestic support measures and export subsidies.

A narrowly defined exception has been made to the general elimination of nontariff measures. Countries may designate certain agricultural products for "special treatment" if they meet specified criteria, thereby exempting them from the tariffication requirement. Despite the right to maintain NTMs on designated products, minimum access requirements will also apply.¹² In order to qualify for special treatment, imports of designated products must comprise less than 3 percent of corresponding domestic consumption in the base period (1986-88). Second, designated products should not have benefitted from any export subsidies since the beginning of the base period. Third, measures restricting domestic production should be applied to the relevant primary agricultural product. The stringency of these conditions means that relatively few products will qualify. The most obvious one that will is rice from Japan.

¹⁰Industrial countries will reduce tariffs by 36 percent over six years and developing countries will do so by 24 percent over ten years.

¹¹Minimum access opportunities are to be provided when imports of a product subject to tariffication are less than 5 percent of domestic consumption in the base period (1986-88). The minimum access opportunity is equal to 3 percent of base period consumption in the first year, rising to 5 percent in six years. In the case where imports of tariffied products exceeded 5 percent of consumption in the base period, countries must maintain the access opportunity that existed in the base period.

¹²The minimum access requirements on designated products will bring their level of penetration from a minimum of 4 percent up to 8 percent by the end of the six-year implementation period. This requirement could lead to an increase in the NTM coverage ratio.

Textiles and Clothing

Discriminatory quantitative restrictions have been prevalent in the textiles and clothing sector for over thirty years, starting with the Short-Term Arrangement Regarding International Trade in Textiles in 1961 (Low, 1993). This was followed in 1962 by the Long-Term Arrangement until 1974, when the first Multi-Fiber Arrangement (MFA) came into being. The current arrangement, MFAIV, runs until December 31, 1994. These arrangements have covered a growing number of products over the years, and have become increasingly restrictive.

From the beginning, quantitative restrictions under the MFA have been administered by exporting countries. Many developing countries considered the elimination of the MFA a priority in the Uruguay Round, bearing in mind that textiles and clothing is a key industry in the early stages of industrialization, and the fact that, with the exception of Japan, the quantitative restrictions only affect developing country exports to the industrial countries, and not trade among the industrial countries.

The Agreement on Textiles and Clothing in the Uruguay Round provides for the elimination of MFA-type arrangements, or in other words, of all NTMs in the sector, over a ten-year period. The phase-out of NTMs is gradual, involving the progressive elimination of quantitative restraints by product category, combined with continuing quota expansion. Restrictions must be removed from products accounting for not less than 16 percent in volume terms (1990) of the items covered by the MFA as soon as the agreement enters into force. There are then three additional phases that take effect at the beginning of the fourth and eighth years and end of the tenth year, in which an additional 17 percent, 18 percent and 49 percent respectively of 1990 import volumes must be fully integrated into the mainstream trading system.

The agreement also establishes a "transitional safeguard" mechanism that allows NTMs to be used in certain circumstances. These safeguards can be applied if increased import volumes cause or threaten serious damage to the domestic industry, and they can be maintained for a maximum of three years. The

safeguard is invoked on a country by country basis, but can only be applied on products which have not yet been integrated into mainstream GATT/WTO rules (i.e. products on which MFA-type quotas may still be applied). A second restriction on the use of the special safeguard is that it cannot be invoked on an eligible (non-integrated) product if that product is already subject to an MFA quota in the market concerned.

Before they are removed, quotas must be expanded by not less than the amount of quota growth during the twelve month period prior to entry into force of the agreement, plus 16 percent, 25 percent and 27 percent in each of the three periods of the phase-out. Quota expansion during the phase-out period could increase NTM coverage ratios in this sector.

Unlike agriculture, where the removal of most NTMs will occur immediately the agreement enters into force, the process in the textiles and clothing sector will be much more gradual. Indeed, 49 percent of all quota restrictions by volume existing in 1990 could still be in place until the last day of the ten year phase-out period. Use of the transitional safeguard could also raise the coverage of NTMs above the levels yielded by the three period phase-out schedule. Moreover, since the MFA and its phase-out program are built on a series of bilateral arrangements, and countries face quite different levels of restrictions, it is difficult to make any straightforward judgements about NTM coverage ratios in this sector, except to say that they will all be zero after ten years.

Safeguards

Over the years, the GATT's safeguard provisions have been used less and less. This was partly because governments preferred to seek bilateral accommodation when addressing import competition considered unacceptably damaging to domestic industry. The GATT's safeguard rules permit the use either of import duties or quantitative restrictions, but require a nondiscriminatory application of measures and payment of compensation through additional trade liberalization.

Voluntary export restraints, and similar bilateral arrangements involving exporters in the administration of restrictions, became an increasingly common approach to the protection of domestic industries. For their part, exporters wished to avoid the inferior outcome of import restrictions, where they would exercise less control and stand a slimmer chance of enjoying any of the rents deriving from the restrictions. Importers preferred a less transparent protective arrangement, and one where neither explicit compensation nor the constraint of the nondiscrimination rule would apply.

Another reason why safeguard measures became less frequent may have been the growing popularity of antidumping and countervailing duty actions. While safeguard actions are a tacit admission of the inability of a domestic industry to compete, antidumping and countervailing duties are instruments whose justification is the counteraction of unfair behavior on the part of foreign producers or governments.

The Uruguay Round Agreement on Safeguards seeks to provide more flexible arrangements, but under tighter rules. There is a relaxation of the nondiscrimination rule in exceptional circumstances, and no compensation or retaliation is foreseen during the first three years that a measure is applied. On the other hand, safeguards can only be applied for a limited period (four years, renewable for a further four), and cannot be renewed during the same amount of time for which they were originally applied. In addition, safeguards must be progressively liberalized, and are subject to surveillance and review.

The most significant feature of the safeguards agreement in the present context, however, is the commitment to eliminate all voluntary export restraints (VERs). All VERs, with the exception of one,¹³ are to be removed within a period of four years. This commitment implies a significant reduction in nontariff measures. However, it is impossible to say to what extent governments will take advantage of their rights under the safeguards agreement to apply quantitative restrictions rather than price-based

¹³The exception of a single measure from the general phase-out commitment was designed to accommodate the wish of the EU to continue to restrict Japanese auto imports. According to the agreement, however, the single exception permitted to each party runs only until December 31, 1999.

measures when they take safeguard action. The fact that VERs are ruled out, combined with relaxation of the nondiscrimination, compensation, and retaliation rules, may encourage the use of safeguards in general, and quantitative restrictions in particular.

IV. Global Trade Implications: The Round and NTMs

Given the global importance of NTMs (Table 1 indicates that \$125 billion of OECD imports from developing countries face these measures), this section seeks to quantify the extent to which the Uruguay Round results will influence the level and structure of nontariff protection. Using published details on the agreement (GATT 1994), Table 3 provides an indication for all developing countries and regional country groups (i.e., developing countries in South Asia, Latin American and the Caribbean, Sub-Saharan Africa, etc.). The top quarter of the table shows the 1992 values of OECD imports from each region - in total and for four product groups: all non-oil goods; ores, minerals and metals; chemicals; and all other manufactures. Directly below these import values, the pre-Uruguay Round NTM coverage ratios are shown for each product and regional group.

The lower half of the table shows estimated post-Uruguay Round NTM trade coverage indices under two alternative assumptions concerning trade values. The first assumption allows for no change in the value of OECD imports from developing countries -- this clearly overestimates the importance of remaining NTMs since there will be an import response in the cases where NTMs are removed. In order to quantify the effects of the Round, NTM-ridden trade in agriculture, textiles and clothing, along with VERs on all other products, is subtracted from the total trade (in all sectors) covered by NTMs and the remainder is then expressed as a ratio to the total value of OECD imports. The second estimate -- see the lower quarter of the table -- attempts to project the expansion of non-OECD trade that should

Table 3. Estimated Impact of the Uruguay Round on Regional Groups of Low and Middle Income Countries' NTM Coverage Ratios.

Product Group (SITC)	East Asia	Eastern Europe	Latin America	Middle East and North Africa	Middle Income Europe	South Asia	Sub-Saharan Africa	All LMIC Countries
1992 Value of OECD Imports (\$million)								
ALL GOODS	197,262.4	67,123.3	118,140.1	38,364.7	36,008.8	32,772.1	28,905.3	519,576.6
All Non-Oil Goods	181,651.1	50,174.1	98,297.6	12,877.4	35,263.0	23,586.4	14,359.7	416,206.3
Ores and Metals	7,028.9	9,512.6	13,189.4	940.7	1,905.6	1,171.9	2,426.7	36,175.9
Chemicals	4,825.9	4,813.6	4,492.0	672.0	1,106.3	247.0	282.2	16,439.0
Other Manufactures	144,765.1	29,238.8	48,716.7	7,573.8	26,518.7	17,173.0	3,831.3	277,817.4
Pre-Uruguay Round NTM Trade Coverage Ratio (%)								
ALL GOODS	18.5	25.6	11.7	9.1	31.1	36.7	16.2	18.0
All Non-Oil Goods	19.5	19.8	11.2	7.8	32.3	37.8	15.5	18.4
Ores and Metals	9.4	19.3	9.6	19.6	12.2	1.5	6.1	10.0
Chemicals	3.3	4.8	3.5	7.0	1.1	1.8	0.2	3.4
Other Manufactures	21.9	19.1	10.4	3.4	41.7	48.9	10.5	21.6
Estimated Post-Uruguay Round NTM Trade Coverage Ratio (%) – Constant Trade Values								
ALL GOODS	3.6	14.0	3.9	6.1	2.1	5.5	9.5	5.5
All Non-Oil Goods	3.5	4.1	1.6	3.6	0.7	5.8	5.1	3.8
Ores and Metals	9.4	19.3	9.6	19.6	12.2	1.5	6.1	10.0
Chemicals	3.3	4.8	3.5	7.0	1.1	1.8	0.2	3.4
Other Manufactures	3.9	2.7	2.7	2.2	0.8	7.2	4.5	4.5
Estimated Post-Uruguay Round NTM Trade Coverage Ratios (%) – Increased Trade Values								
ALL GOODS	2.6	11.8	3.4	5.8	1.1	3.5	8.5	4.2
All Non-Oil Goods	2.5	1.8	1.2	3.4	0.3	3.6	4.3	2.8
Ores and Metals	9.4	19.3	9.6	19.6	12.2	1.5	6.1	10.0
Chemicals	3.3	4.8	3.5	7.0	1.1	1.8	0.2	3.4
Other Manufactures	2.8	2.1	2.3	2.1	0.5	4.0	4.0	3.0

Note: The trade values and NTM coverage ratios shown in this table are for the OECD countries listed in the notes to Table 1.

Source: World Bank-UNCTAD SMART Database.

occur for each regional country group as a result of the removal of nontariff measures (see World Bank, 1992 for published details concerning these estimates). Total exports from developing countries are assumed to equal pre-Uruguay Round trade plus the expanded trade that should result from the NTM liberalization. The NTM coverage ratios are then recomputed using the procedures outlined in footnote 13, but with this new larger trade base.¹⁴ Figure 1 provides a graphical illustration of the projected magnitude of change in pre and post-Uruguay Round NTM coverage ratios for all non-oil exports of developing countries.

Both Table 3 and Figure 1 indicate that the Uruguay Round dramatically changed the share of developing countries' exports that faced OECD nontariff restrictions. Overall, the developing countries' NTM coverage ratios decline by approximately three-quarters, but for South Asia the ratio falls from 37 percent to about one-tenth its pre-Uruguay Round level. The main reason for this 33 percentage point decline is the high share of textile and clothing products in South Asia's exports which are subject to MFA restrictions. A similar decline (from 31 to 1 percent) for middle income Europe is attributable both to textiles and clothing and temperate zone agricultural products.

Figure 1 indicates that Eastern Europe and Sub-Saharan Africa will be the regions least affected by the Uruguay Round achievements on nontariff measures. The Eastern European results are largely

¹⁴The projections incorporate two distinct elements i.e., trade creation (TC_{ij}) and trade diversion (TD_{ij}). The former represents the substitution of imports for domestic production as trade barriers are lowered. SMART estimates this term using,

$$(2) TC_{ij} = [M_{ij} * e_{di} * dt_i] \div [(1 + t_i) * (1 - (e_{di}/e_{si}))],$$

where M_{ij} is the value of imports of product i from country j , e_{di} is the price elasticity of import demand, t_i is the tariff on the product, and e_{si} is the supply elasticity. The projections were run using an assumed infinitely elastic supply term. Trade diversion was estimated from,

$$(3) TD_{ij} = TC_{ij} * [M_{ij}/V_{ij}],$$

where the term in parentheses is the share of imports from non-preference receiving countries in domestic consumption of the product.

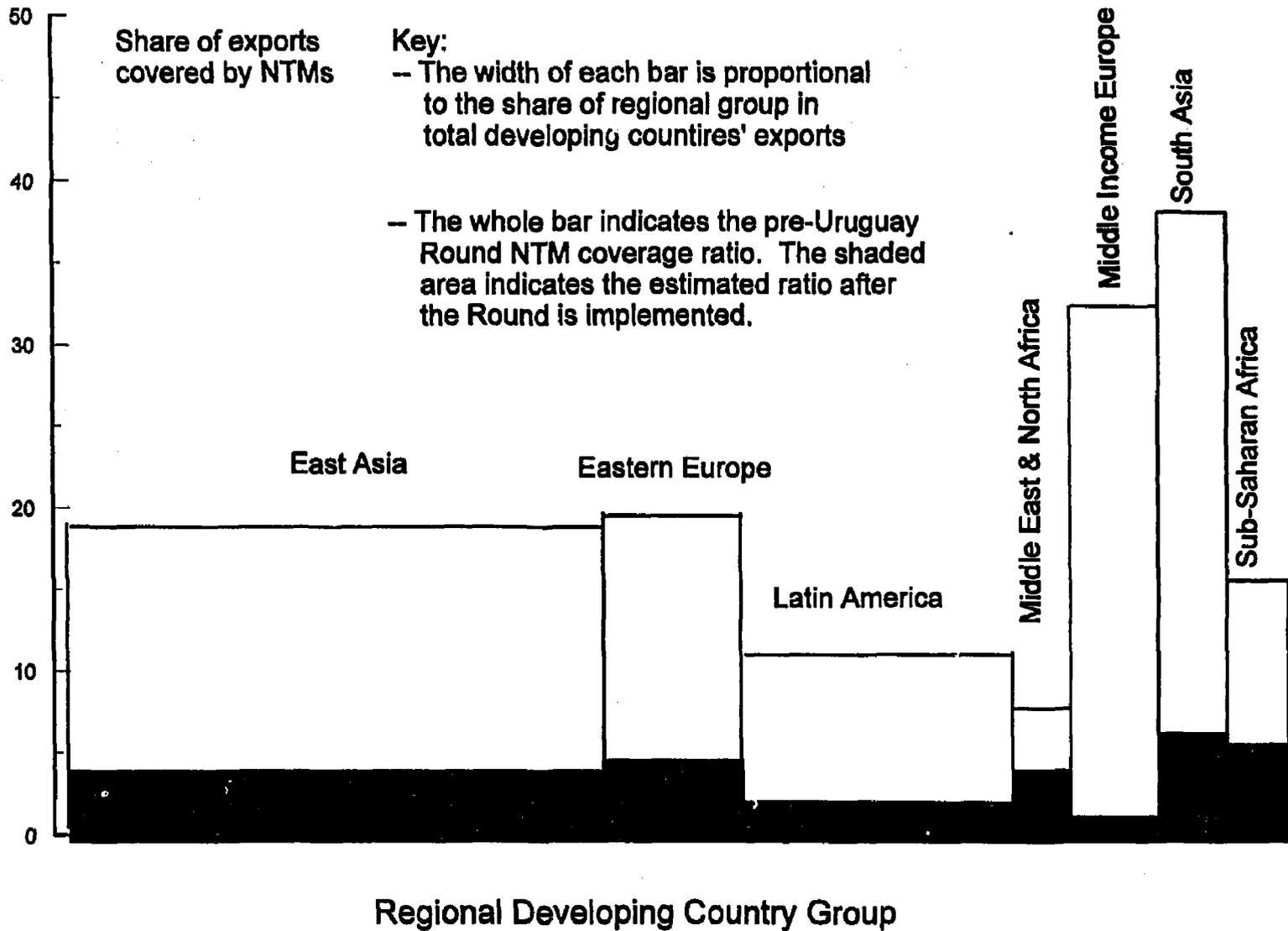
Table 4. Estimated Impact of the Uruguay Round on NTM Coverage Ratios for Individual Developing Countries.

Developing Country	Nontariff Measure Trade Coverage Ratios (%)								
	1992 OECD Imports (\$million)			Pre-Uruguay Round			Post-Uruguay Round		
	All Goods	All Non-oil Goods	Other Manufactures	All Goods	All Non-oil Goods	Other Manufactures	All Goods	All Non-oil Goods	Other Manufactures
Argentina	6,603.7	6,238.1	1,178.9	21.5	21.8	19.2	3.7	3.3	11.4
Bangladesh	2,059.9	2,056.4	1,862.4	58.3	58.6	74.1	10.5	10.4	13.3
Brazil	24,361.3	24,059.9	10,297.5	12.6	11.1	12.9	3.7	1.8	4.5
Chile	7,012.7	7,008.1	719.9	7.7	7.7	2.3	0.6	0.5	1.2
China	70,347.0	67,255.3	59,169.0	18.2	19.1	23.5	3.3	2.8	2.2
Dominican Republic	2,710.9	2,710.9	2,155.3	35.7	35.7	39.8	0.2	0.2	0.1
Egypt	3,853.4	1,447.3	1,003.9	23.2	31.8	66.5	9.3	0.6	1.2
Haiti	145.2	145.2	122.5	13.2	13.2	15.3	0.4	0.4	0.0
Hong Kong	26,367.6	26,365.6	25,147.6	34.3	34.3	35.3	1.8	1.8	1.8
India	13,532.3	13,162.2	10,551.1	29.4	30.6	40.9	5.1	5.4	7.1
Jamaica	1,286.6	1,286.5	779.8	35.4	35.4	85.5	2.3	2.3	0.4
Jordan	147.7	147.7	91.0	2.3	2.3	0.6	1.1	1.1	0.5
Republic of Korea	42,981.2	42,308.9	39,357.9	24.0	24.1	25.8	10.9	10.8	12.3
Malaysia	23,862.1	21,536.9	16,021.3	6.5	7.5	13.1	0.7	0.7	0.9
Mexico	43,300.5	35,767.5	29,149.9	8.0	5.5	4.7	4.7	1.4	1.3
Morocco	4,777.8	4,700.3	2,705.4	30.2	30.5	46.4	3.0	2.8	6.6
Pakistan	3,978.6	3,967.6	3,511.7	50.4	50.4	59.6	6.9	6.8	8.2
Philippines	9,495.7	9,420.5	6,546.4	20.4	20.7	33.1	1.2	1.2	1.8
Senegal	362.4	356.8	21.2	25.2	25.2	9.0	0.9	0.9	7.2
Sri Lanka	2,066.5	2,058.8	1,709.7	50.5	50.7	67.8	0.9	0.8	0.5
Taiwan, China	55,334.7	55,311.4	50,621.6	12.0	12.0	13.1	3.1	3.1	3.4
Thailand	22,543.7	22,451.6	15,010.9	25.3	25.5	21.4	2.2	2.2	2.9
Tunisia	3,376.7	3,009.9	2,586.2	25.7	28.3	31.1	4.6	2.0	3.0
Uruguay	789.7	789.7	294.3	48.3	48.3	53.8	8.9	8.9	12.2

Note: The 1992 OECD import and trade coverage ratios are for those countries listed in Table 1. See Table 1 for an indication of the products included in the other manufactures group.

Source: World Bank-UNCTAD SMART Database.

Figure 1: The Trade Coverage of OECD Nontariff Measures on Regional Groups of Developing Countries Non-Oil Exports Before and After the Uruguay Round



accounted for by the relatively high share of chemicals and energy products in total exports – these products face quotas and special product-specific charges. Eco-labelling requirements are largely responsible for the relatively high share (about 6 percent) of sub-Saharan Africa's non-oil exports that face post-Uruguay Round NTMs. The cost of compliance with these requirements may be relatively low. However, Varangis et. al. (1993, p.20) suggest that their adoption could have potentially negative implications for African tropical timber exports.

Table 4 provides a less aggregated view of the Uruguay Round's achievement by showing how the pre- and post-Uruguay Round NTM trade coverage ratios should change for selected developing countries. These projections are made under the constant trade value assumption and, as a result, overstate the importance of nontariff measures that will remain after the Round.¹⁵ Even so, the impact on some countries is dramatic. The NTM coverage ratio for all Sri Lankan exports, for example, declines from over 50 percent to under 1 percent – an even greater reduction occurs within "other manufactures" (see Table 1 for a list of products included in this group). A decline of 40 percentage points or more is also projected for Bangladesh and Pakistan. The declines for all of these countries are accounted for by the preponderance of textiles and clothing products in their total exports.

V. Policy Substitution

The impending elimination of the bulk of NTMs faced by developing countries in industrial country markets is a remarkable achievement, notwithstanding the fact that the phase-out will take up to ten years and that agricultural tariffication might in some cases lead to short-term increases in protection

¹⁵Analysis of our underlying trade and trade barrier information indicate that several two-digit SITC chemical products like mineral tars and crude compounds (SITC 52), manufactured fertilizers (SITC 56), or plastic materials (SITC 58) will have trade coverage ratios ranging from 5 to 10 percent due to the imposition of quotas and restrictive licensing regulations. Tariff quotas will apply to over 10 percent of wood manufactures, while non-automatic licensing regulations will be applied to between 5 and 12 percent of medicinal product imports (SITC 54) and manufactured fertilizers (SITC 56). Tariff quotas and special product specific charges (like retaliatory duties) will remain on a few products, but their coverage ratios will not exceed 2 percent. Special entry regulations, like eco-labelling requirements, will continue to be applied to a fairly high share of some crude material products classified in SITC 2 as well as rubber, wood and leather manufactures.

levels. The benefits of these changes for developing countries come not only in the form of prospective increases in export sales, but also greater predictability of market access. Another significant benefit may be greater price stability in international markets (Box 1). Perhaps it is the gradual pace at which the reforms will be introduced that makes them politically palatable in industrial countries. But considering that the NTM problem remained intractable for so long, it is not unreasonable to speculate about the likelihood of renewed demands from industrial country producers for new measures to insulate them from import competition. In what policy areas might such pressures emerge? The two most likely candidates are safeguards and antidumping measures.

It was noted in Section III that the new safeguards agreement may result in more frequent use of these measures, and that the option of applying quantitative limitations rather than tariffs may be preferred. In particular, a relaxation of the compensation requirements, combined with the possibility of a discriminatory application of safeguards, could encourage their use. In addition, there appears to be some risk that measures closely resembling voluntary export restraints (VERs) may have been legitimized under certain conditions in the new agreement. Article 11 of the agreement provides for the elimination of VERs and similar measures, but a footnote to the article states that an import quota "applied as a safeguard measure in conformity with the relevant provisions of GATT 1994 and this Agreement may, by mutual agreement, be administered by the exporting Member." A country wishing to make use of this provision must carry out an investigation and make a determination of serious injury or threat thereof. These procedural requirements may temper the use of safeguards, but not eliminate the risk of VERs re-emerging under a quasi-official guise.

Box 1: Nontariff Measures and Price Instability

Initial analyses of the Uruguay Round's accomplishments relating to NTMs tend to focus on the associated trade gains. This orientation understates the importance of what was achieved. Developing countries, for example, have long been concerned with the effects of price and earnings instability for their major exports and it is recognized that industrial countries' nontariff measures are an important source of this instability. For example, quotas and other quantitative restrictions (like VERs) make the import demand curve completely inelastic at the point where they become operative. As such, any shift in export supply will result in a greater price change than that which would occur under normal (not perfectly inelastic) demand conditions. Similarly, European countries' variable import levies -- which are widely applied to agricultural imports -- are designed to shield domestic producers from instability in agricultural prices and earnings, but in doing so have a destabilizing influence on international markets.

Variable levies may have both an upward and downward destabilizing influence on the products to which they are applied. When world prices rise variable levies fall and may become negative (i.e., they become subsidies on imports) if the world price rises above the EC's threshold price. In this case, EC import demand is higher than under a nominal tariff. The excess demand in an inflationary period contributes to a further increase in world prices. In periods when world prices are falling, however, the variable levies rise thereby restricting any increase in demand. Thus, through their perverse effects on import demand variable levies destabilize world prices. Although the EC and many EFTA countries rely heavily on these measures variable levies are also used by the United States and Japan.

Aside from levies, other types of nontariff measures are also recognized to have a destabilizing impact on international trade and prices. For example, in an analysis of international commodity markets the OECD (1982) compiled the following matrix which showed how international price stability would be

Importing Country Measures	Variance of Price Instability Compared to Instability Under Free Trade	
	Exporting Country	Importing Country
Specific Tariff	Same	Same
Ad Valorem Tariff	Smaller	Larger
Fixed Quota	Generally Larger	Generally Larger
Proportional Quota	Generally Larger	Generally Larger
Import Prohibition	Generally Larger	Generally Larger
Price Fixing	Larger	Smaller (=0)
Variable Levy	Larger	Smaller

affected by different NTMs relative to what would occur in a free trade situation. The importance of the above classification is highlighted by the fact that Laird and Yeats (1990, p. 105) show that more than 70 percent of EC(10) imports of meat, cereals, dairy products, sugar and honey, live animals, and beverages are subject to variable import levies or minimum import prices. Levies are also applied to over 80 percent of Japan's sugar and honey imports while fixed quotas are applied extensively to Japan's meat, dairy, fish and cereal imports. While attempts to quantify exact magnitudes would be useful, there is every indication that the Uruguay Round's "tariffication" of NTMs will make an important contribution to the reduction of global price and trade instability for agricultural products.

The situation with respect to antidumping is potentially more troublesome still. Antidumping measures have been the subject of growing attention in trade policy discussions, as their use has intensified over the last decade and more. Many analysts emphasize what they regard as a protectionist bent in the formulation and application of antidumping laws and regulations (see, for example, Boltuck and Litan 1991, Finger 1993, Messerlin 1989, and Tharakan 1991). The most basic problem with dumping is that it is defined merely as price discrimination between the domestic and export sales of a firm. This makes dumping a ubiquitous practice, as profit maximizing firms can be expected to charge different prices in segmented markets.¹⁶ Instead of using antidumping as a mechanism to deal with welfare-reducing pricing strategies, as would be the case were the practice to be defined in terms of predatory pricing behavior, antidumping has become yet another instrument in the arsenal of possible measures for insulating domestic producers from import competition. As Finger and Murray (1993) show, the ease with which the claim of a positive dumping margin can be supported tends to make the injury test the only feature of the procedures that may lead to an unsuccessful antidumping petition. Several of the authors mentioned above have identified procedures and definitions used in antidumping investigations that bias the findings in antidumping cases in favor of petitioners.¹⁷

Attempts by some countries in the Uruguay Round to impose additional discipline on the use of antidumping measures met with limited success. While providing more detailed procedural guidelines and exerting additional controls in certain areas, the agreement does not provide guarantees against the use of antidumping measures that can severely curtail imports over an extended period of time. A general

¹⁶The existence of tariffs against imports in the market of the exporting firm will be sufficient to allow the firm to charge more on domestic than export sales, and thus run the risk of facing an accusation of unfair trading through dumping.

¹⁷For example, some of the techniques leading to an upward bias in dumping margin calculations include: i) identifying a dumped sale by comparing an average number for domestic sales with individual observations on export sales; ii) excluding sales below cost in calculating a domestic price for comparison with export prices; iii) resorting to "best information available" without sufficient critical assessment of available data; and iv) constructing costs with arbitrary assumptions about profits and administrative selling costs.

difficulty with rules on such matters as dumping is that no matter how detailed the rules become, there will nearly always remain scope for interpreting them in ways that produce the desired trade restricting outcome. Restraint, therefore, will reside primarily in the behavior of the administering authorities, not in the constraints of the law. Any hope that precedents might be established to tilt decisions more in favor of respondents in antidumping cases seems remote in the face of dispute settlement provisions that prohibit panels from choosing between competing "permissible" interpretations of the agreement.

Table 5 records the number of antidumping cases initiated by signatories to the GATT Antidumping Code from 1985-92. The Table shows the predominance of the EU, United States, Canada, and Australia as users of antidumping measures, although Mexico has been catching up in recent years. Few developing countries use antidumping mechanisms, but an increasing number are introducing or reviving dormant antidumping legislation.¹⁸ In contrast to the situation in respect of pre-Uruguay Round NTMs, it is the industrial countries rather than developing countries that are affected by the bulk of the measures taken. However, if antidumping actions are used by industrial countries as a substitute for the NTMs phased out in the Uruguay Round, then developing countries will find themselves on the receiving end of an increasing proportion of a growing total number of antidumping actions.

VI. Conclusions

The Uruguay Round will bring about a dramatic reduction in the use of NTMs in the areas of trade where these measures have predominated in the past. The effect will be most noticeable in the agriculture and textiles and clothing sectors, but the phasing out of VERs will also have a significant

¹⁸Countries not listed as users in Table 5 that have recently introduced or re-activated antidumping legislation include Argentina, Bolivia, Chile, China, Colombia, Egypt, Indonesia, Israel, Jamaica, Malaysia, Morocco, Peru, the Philippines, South Africa, Thailand, Trinidad and Tobago, and Venezuela.

Table 5: Initiation of Antidumping Investigations, 1985-92

Country of petitioner	No. of cases	Country of respondent	No. of cases
European Union	242	European Union or Member States	209
Japan	3	Japan	105
United States	300	United States	100
Korea	9	Republic of Korea	78
		China	69
		China, Taiwan	68
Brazil	13	Brazil	54
		Yugoslavia (former)	31
Canada	129	Canada	25
Poland	24	Poland	24
		Czech Republic & Slovakia	23
		Romania	23
		Hong Kong	22
Mexico	84	Mexico	22
		Turkey	22
		Thailand	19
		Singapore	18
		Argentina	17
India	5	India	17
		USSR (former)	16
Sweden	11	Sweden	15
		Venezuela	14
		Hungary	12
		Malaysia	12
Austria	4	Austria	11
		Indonesia	9
		Israel	8
		Norway	6
		South Africa	6
		Colombia	5
		Philippines	5
		Saudi Arabia	5
		Bulgaria	4
Finland	13	Finland	4
New Zealand	29	New Zealand	4
		Bangladesh	3
		Egypt	3
		Chile	3
Australia	282	Australia	2
		Kazakhstan	2
		Russian Federation	2
		Trinidad and Tobago	2
		Ukraine	2
		Others	47
TOTAL	1148	TOTAL	1148

Source: GATT (1993) International Trade and the Trading System: Report by the Director General 1992-1993 (Geneva: GATT).

impact. Although NTMs in the agricultural sector will be almost entirely eliminated as soon as the results of the Uruguay Round enter into force, many textiles and clothing restrictions could take as long as ten years to eliminate, and VERs will be phased out over a period of four years. The implications of the drastic reduction in NTMs foreseen in the Uruguay Round are more far-reaching for developing countries than industrial countries in terms of their export interests, because of the more extensive application of NTMs to developing country trade. In this sense, the Uruguay Round will contribute to a more "level playing field."

The success of the Uruguay Round in reducing the use of NTMs is likely to generate pressures for new measures. A major challenge, therefore, especially in the industrial countries, will be to resist demands for policy substitution. The greatest risk of this occurring comes in the areas of safeguards and antidumping measures. Certain modifications in the safeguards provisions make the remedy more user-friendly, especially in terms of relaxing the compensation requirements and permitting a discriminatory application of safeguards under certain circumstances. On the other hand, the safeguards agreement requires that proper investigations and determinations are made prior to the adoption of safeguard measures. Moreover, the agreement ought to induce greater multilateral accountability. Another advantage of the new arrangements is that safeguard measures must be of limited duration. Trends in the use of antidumping measures over the last decade or so, together with the failure of the Uruguay Round to impose stronger limitations upon the use of these measures, suggest significant potential for the antidumping instrument to become the cutting edge of discriminatory protection in the post-Uruguay Round trading system. How willing will governments be to resist such a trend?

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