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ECONOMICS, ECOLOGY AND THE ENVIRONMENT

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**Globalisation, WTO and
Sustainable Development**

by

Clem Tisdell

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Globalisation, WTO and Sustainable Development*

By

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A CHINA/WTO PAPER

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GLOBALISATION, WTO AND SUSTAINABLE DEVELOPMENT

Abstract

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This overview is divided into two main sections. The first sections reviews the literature on the impact of economic globalisation (involving of liberalisation of international trade and investment) on the state of the environment and sustainable development. While the WTO and Bretton Woods institutions believe that this impact can be expected to be favourable, divergent rational views can be found in the economics literature. A review of the relevant literature reveals that the situation is far from being black-and-white – there are grounds for rational doubt notwithstanding the use of Environmental Kuznet's curves, which on the surface seem to provide grounds for optimism.

The second main section dealt with the attitude and policies pursued by GATT-WTO in relation to the environment and sustainable development. These appear to be based on orthodox neoclassical economic theory which is mostly static in nature. In practice, virtually no allowance is made by the WTO for the environment and for sustainable development. The Rio Declaration, Agenda 21 and the Winnipeg Principles have had little or no impact on its policies. A charitable interpretation of its policies would be that it is pursuing weak conditions for sustainable development. Both changing public opinion and evolving academic thought are raising major challenges to WTO's basic theory and its approaches to environmental protection. Different views expressed at the Seattle Meeting cannot continue to be ignored. New efforts are needed to ensure that WTO plays a more constructive role in the future in coordinating trade, environment and development, and a way forward is suggested.

GLOBALISATION, WTO AND SUSTAINABLE DEVELOPMENT

1. LITERATURE BACKGROUND ON THE IMPACT OF ECONOMIC GLOBALISATION (LIBERALISATION OF INTERNATIONAL TRADE AND INVESTMENT) ON THE STATE OF THE ENVIRONMENT AND SUSTAINABLE DEVELOPMENT.

The environment was given no attention in early theories of international trade and the earliest theories of international investment. Possible environmental externalities from international trade (not to mention the implications of international trade for sustainable development) are ignored, for example, in the theory of trade based on comparative advantage (Ricardo, 1817) and in the factor-proportions theory advanced by Heckscher and Ohlin. In terms of these theories, it is possible to show that free international trade (involving perfect competition) will, in a static setting, ensure maximum economic efficiency in satisfying global wants in the sense of Vilfredo Pareto. This implies that under a perfectly competitive system, it is impossible to make anyone better off without making someone else worse off. But this is only true under static conditions and in the absence of market failures which may arise, for instance, due to the presence of environmental externalities. Furthermore, it does not follow that all necessarily gain from a switch from restricted international trade to a liberalised regime – some may gain and some may lose. However, it is normally argued that the gainers could compensate the losers and remain better off than before the change, so a Kaldor-Hicks or potential Paretian improvement is possible. Even if compensation is not paid to the losers (as is often the case), supporters of free trade suggest that in long-term all will gain as they adjust to the liberalised situation.

In a dynamic setting, the ‘economic virtues’ of trade liberalisation are less clear, even if environmental and sustainability aspects are ignored. Schumpeter (1942), for example, recognized that in some circumstances limitations on competition might promote

technological progress and economic growth. List (1840) argued that countries behind in the international competitive race might find it advantageous to provide temporary support to selected industries (infant industries) in order to improve their long-run competitive advantage and national economic welfare. The advantages and disadvantages of highly competitive market competition in a dynamic setting are much more complex than allowed for in static economic theory, as defined in Schumpeter's sense.

Many economists, however, believe that not only does a high degree of international market competition have allocative advantages as indicated by static economic theory but such competition also stimulates technological progress and economic growth (Vickers, 1995). A dissenting view is that a high degree of market competition may retard R&D and economic innovation (Schumpeter, 1942). In practice, the situation may be that while a moderate degree of market competition stimulates technological progress, a high degree of market competition retards it (cf. Hartley and Tisdell, Ch.9). There is also the possibility that in some cases international competition may result in a high degree of market concentration as a result of evolutionary processes, and the consequent lack of diversity of business organization may retard the evolution of new techniques (Tisdell, 1999b). In short, even ignoring environmental and sustainability issues, it is not proven in the economic literature that perfectly competitive international market systems (and laissez-faire market systems) are always socially ideal, although they are often superior to some of their alternatives.

It is understandable that early economic theorists dealing with international trade were not concerned about environmental issues or sustainability questions to the same extent that today's economists are. There are several possible reasons for this:

- a) in earlier times when incomes were lower than now, there may have been less demand for environmental goods; there is some evidence that the demands for environmental goods are normal, which means that the demand for these rises with income;
- b) global environmental problems were of smaller magnitude in the past e.g. the greenhouse gas problem, or less apparent than they are now; and

- c) the possibility that economic development may prove to be unsustainable for environmental reasons was not fully appreciated.

In the latter respect, it is true that Ricardo recognized that finite land resource plus diminishing marginal returns to the utilization of those resources could impose limits on economic growth and development, particularly if the Malthusian theory of population growth applied. While technological progress and capital investment could result in growth of per capita income, it was likely, in his view, that this would stimulate population growth so that the economic benefits could be short-lived.

On the other hand, Engels (1959) was much more optimistic. He argued that the speed and economic benefits from scientific progress would outpace any disadvantages from likely increases in population.

It could be argued that this increase explains the process of economic development of today's high income countries, as their economic growth on average has outstripped their rate of population growth due to capital accumulation and technical progress. Moreover, with higher per capita incomes and changed social conditions, such as increasing urbanization, it was found that Malthus' theory of population growth did not apply. Today's more developed countries experienced demographic transition and subsequently their rates of natural population growth have approached zero or have even become negative.

But such a favourable course of events has not averted fears of a Malthusian-type. There are fears that the type of economic development experienced by Western countries will prove to be unsustainable on a global scale due to natural resource depletion and global pollution (such as greenhouse gas emissions) generated by economic activity; views strongly stated by some neo-Malthusians in the early 1970s (Forrester, 1971; Meadows *et al.*, 1972). It was also recognized that population growth may only be part of the sustainability problem. Massive transformation of natural resources into material goods for human use and exploitation of the natural environment to satisfy high levels of material

consumption and man-made investment also creates a problem because this results in increasing scarcity of natural/environmental resources and growing levels of pollution. Consequently neo-Malthusians argue that continuing economic growth based on the conversion of natural resources and natural environments to man-made commodities may well prove to be unsustainable.

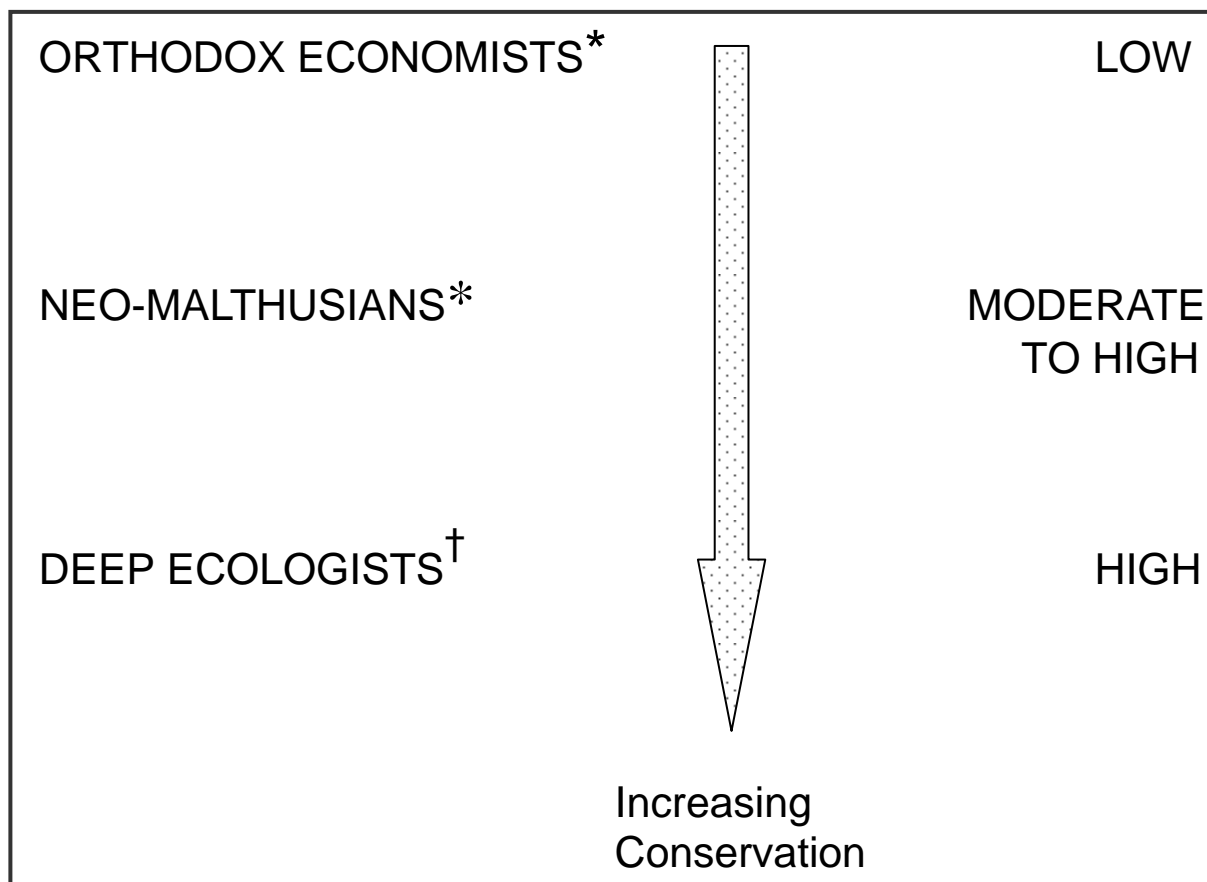
This has led most neo-Malthusians to recommend that strong conditions or restrictions should be imposed on the transformation of natural resources/environments into man-made capital and material goods. Most believe that more caution should be displayed in reducing stocks of natural and environmental resources than has been the case in the past and some suggest that these stocks should not be allowed to fall below current levels, otherwise economic production, economic activity or economic growth is likely to be unsustainable.

The United Nations Conference held in 1972 in Stockholm marked a significant political turning point in global quest to achieve sustainable development. It resolved that the world as a whole should strive for sustainable development and began a search for means to achieve this goal. The World Commission on Environment and Development was subsequently established to find these means and it published its findings in *Our Common Future* (World Commission on Environment and Development, 1987). This was important background document for the United Nations Conference on Environment and Development held in Rio de Janeiro in 1992. This conference, a follow-up to the 1972 Stockholm Conference, resulted in several important resolutions about global environmental conditions as noted below.

In the economics literature, considerable debate has occurred between economists who claim that strong restrictions on the use of natural and environmental resources are needed to ensure sustainable development (the neo-Malthusians) and those who argue that accumulation of man-made capital is a suitable bequest for future generations and the best means for achieving sustainable development. The latter view is the orthodox economic view and was also a view shared by Karl Marx and by Engels. Both sides see sustainable economic development, that is development which results in the income of future

generations being no less than that of the current generation, as the appropriate goal. The debate is, for example, highlighted in a special issue of *Ecological Economics* edited by H. Daly (1997). The orthodox economic position (e.g. Solow, 1974) relies to a large extent on the assumption that scientific and technological progress will continue at a sufficiently rapid rate to offset reductions in natural resource availability and/or deterioration in natural environments. Thus a division of opinion exists in the literature which is highlighted by Figure 1. This division is important since it results in different views about the benefits of free trade.

**Figure 1:
SPECTRUM OF EMPHASIS ON NATURAL RESOURCE AND
ENVIRONMENTAL CONSERVATION**



* Values are anthropocentric

† Values not purely anthropocentric, includes ecocentric values

Note: Strategies for Ecologically Sustainable Development (ESD) are likely to be towards the lower portion of the above spectrum.

Neo-Malthusians as a rule believe that free markets are unlikely to conserve natural and environmental resources to the extent necessary to achieve sustainable development, if sustainable development is indeed achievable, or more generally that free markets are likely to result in less sustainability of economic development than is desirable. However, neo-Malthusians do not contend that centrally planned economies or markets involving government intervention will give a perfect result or a better result. One can cite examples where government intervention has exacerbated the environmental situation. But on the other hand, it must be recognized that in some cases government intervention is desirable and even if not perfect, can be better than the alternative. Given the neo-Malthusian view, such intervention may involve restrictions on resource-use and on pollution (a) to correct market failures or (b) to conserve resource and environmental stocks (e.g. our biodiversity bank).

Considerable debate has occurred about the effectiveness of free markets in fostering resource conservation. In the late 1980s and early 1990s, some World Bank and Asian Development Bank economists and their advisers (Sebastian and Aliabusan, 1989; Hansen 1990, *a, b, c*) argued strongly that Structural Adjustment Policies on balance are favourable to the environment, that is free markets and small government favour environmental conservation. However, this is a generalisation based upon limited evidence. As Mearns (1991) points out, the consequences of free trade and structural adjustment policies for environmental conservation are quite variable (cf. Tisdell, 1999b, Ch.6). The overall consequences of structural adjustment policies for the state of the environment still remain uncertain (Anderson, 1998).

A major tool used in recent arguments about the environmental impacts of economic growth and free trade is the Environmental Kuznets Curve (see for example, Cole *et al.*, 1997; Cole, 1999, 2000) and related functions. Empirical evidence indicates that the intensity of emissions (emissions in relation to GDP) of many pollutants at first rises and then declines. This implies that beyond some level of GDP (or probably GDP per capita) pollution intensities fall. In turn, this suggests that if sufficient economic growth is achieved, pollution intensities will continue to fall with further growth.

There may be several reasons for this phenomenon. These include changes in the composition of national production to involve a greater proportion of production by industries which have low pollution intensities, such as many services industries or high tech industries, greater demand for cleaner environments as incomes per head rise, adoption with economic growth of technologies less wasteful of resources and so on. This suggests that one should be optimistic about the long-run environmental impacts of economic growth. Thus if freer international trade stimulates economic growth, it should, given this view, have a positive environmental impact in the long run.

In addition, it is often argued that the Kuznets environmental curve will be lower under a free market system than under central planning (Zylicz, 1994). So a free market system could bring a double bonus to formerly centrally planned economies: (a) lower pollution intensities on account of the use of the market system itself and (b) greater economic growth which should bring about declining pollution intensities in the long-term. Enhanced international freedom of trade should also have similar consequences via its growth-inducing impacts.

But the argument may be too simplistic for several reasons:

- a) Even if pollution intensities fall, total pollution levels may continue to rise (Tisdell, 1997a)
- b) The model assumes that pollution is a flow and not cumulative (a stock), and
- c) irreversibility of environmental impact is not given consideration such as may occur with loss of biodiversity (Tisdell, 1993).

Not all pollutants behave in the same manner, and even if national or regional pollution levels fall in more developed areas, pollution may rise globally as economic growth occurs in other areas. Even though, in theory, pollution-intensities or levels might fall globally with sufficient growth, in practice critical global pollution thresholds e.g. in relation to greenhouse gas emissions, may be reached before this fall occurs. This may result in environmental catastrophe and collapse in the level of economic production (see Tisdell,

2000a). Thus the long-term environmental benefits of continuing global economic growth are far from clear.

Apart from the pollution problem, economic growth involving conversion of natural resources to man-made commodities continues to raise doubts on its sustainability. Although pollution intensities appear to have fallen in high-income countries, by contrast material intensities per capita appear to be rising according to data assembled by the Wuppertal Institute and other bodies (World Resources Institute *et al.*, 1997). This suggests that natural resource stocks are being used up or converted into man-made commodities at an increasing rate. This indicates that natural resource stocks are annually declining by an even increasing absolute amount. Thus the more developed countries, and the world as a whole, deviates increasingly from satisfying strong conditions for sustainable development. The world is depending on weak conditions to achieve sustainable development.

An interesting side issue in the literature has been debate about the extent to which polluting industries 'migrate' internationally in response to differences in environmental regulations between countries. To the extent that such migration occurs, countries with stricter environmental regulations will undergo structural industrial change and workers in polluting industries may feel that their employment is threatened. This issue has been raised by organized labour in the USA in relation to China and its entry to the WTO (see Tisdell, 2000b). Furthermore, where environmental regulations are imposed in a country (such as Denmark) with a view to reducing global pollution and the industries affected move offshore, the net consequence may be that these measures have little or no impact on the level of global pollution.

2. GATT-WTO AND SUSTAINABLE DEVELOPMENT: A SURVEY

Although sustainable development has become a major objective in modern times, the objectives of GATT/WTO seem to remain 'frozen' from the past, and some critics would suggest that this is true of all Bretton Woods organizations, such as the IMF and the World Bank. To a large extent the WTO has remained aloof from the Rio Declaration, Agenda 21

and the Winnipeg Principles, which may help to explain the wrath and riots surrounding its Millennium Meeting in Seattle towards the end of 1999. There are a number of matters that are worth considering specifically.

2.1 WTO, Trade, Sustainable Development and Environmental Issues

The stated objective of GATT and the WTO is “to provide secure and predictable international trade environment for the business community and a continuing process of trade liberalisation in which investments, job creation and trade can thrive.” While the importance of sustainable development is stressed in the preamble to the charter of the WTO, because it is only mentioned in the preamble it does not put any legal obligation on WTO to strive to attain this goal. Nevertheless, since both weak and strong conditions have been proposed in the literature as means to achieve sustainable economic development (Tisdell, 1999a), WTO might claim that in promoting global economic growth, it is also fostering sustainable development by relying on the weak hypothesis to achieve this goal. At most, it seems that WTO relies on weak conditions to achieve sustainable development.

In general, the WTO and GATT have not been prepared to support international trade restrictions based on the proposition that the exporter has in producing the commodities exported caused unacceptable environmental damage in the exporting country or in its exclusive marine zone. Environmental damages within the country of origin of an exported commodity are immaterial from the point of view of WTO’s charter. Thus, when the USA banned the import of tuna from Mexico on the basis that catching of the tuna by Mexico involved an unacceptably high by-catch of dolphins, WTO ruled that the ban by the USA was illegal. The technique used for production cannot be a basis for trade discrimination, even if use of the technique seriously damages the environment. The only exception is where the technique used leaves identifiable traces in the exported product, and the trace substances might be injurious to health or the environment in the importing country. Thus chemical residues in beef arising from the use of pesticides in an exporting country could be used by the importer to reject imported beef or discriminate against beef exports from the country concerned.

Under the sanitary and phytosanitary provisions of the WTO, an importing country may discriminate against exports from another country if that import impose unacceptable health or environmental risks to the importing country. For example, some importing countries refuse to accept beef from countries with particular cattle diseases for fear that this may result in disease outbreaks in the importing country. It may also be possible to ban the import of genetically modified live organisms on the grounds that this import poses a serious risk to the gene pool in an importing nation. (Compare Xue and Tisdell, 2000). However, phytosanitary and related environmental restrictions on imports must be based on adequate scientific evidence. Where a ban is imposed on sanitary and phytosanitary grounds, it may be overturned on appeal to WTO by the exporter(s) if it based on inadequate scientific evidence.

While the WTO has formed an Environment and Trade Committee to help guide its policies, general disappointment has been expressed about the effectiveness of this Committee (Cole, 2000). It continues to emphasize almost exclusively the environmental advantages of trade liberalization in a manner similar to that proposed by the World Bank (Sebastian and Alicbusan, 1989) a decade earlier. In doing so, it only considers part of the debate about trade and the environment. It ignores, for example, the debate about what conditions (weak and strong) are needed to achieve sustainable development, and instead concentrates on allocative or resource balance issues ignoring the debate about the absolute declines in global natural and environmental resource stocks.

It seems from the focus of the submission by Australia to Committee on Trade and Environment (Committee on Trade and Environment, 1999) that studies of this Committee have been jaundiced, that is are one-sided in the sense that they have concentrated on the environmental advantages of free trade to neglect of possible negative environmental consequences.

For instance, according to Committee of Trade and Environment (CTE) (1999, p.1) the Marrakesh Meeting of WTO directed CTE to examine the environmental benefits of removing trade restrictions and distortions. The Singapore Ministerial Declaration

emphasized on the basis of the work of CTE “the scope of complementarities between trade liberalization, economic development and environmental protection”. In particular, Australia and several members of the Cairns group have stressed the potential for “a ‘win-win’ strategy where trade reform could contribute to improvements in both trade and environmental conditions”.

Nevertheless, the following position of Australia seems justified. Australian in a submission to CTE stated

“ Consequently, there must be considerable scope for reform to subsidy policies that would deliver economic, trade, environmental and equity benefits. Given the amount of resources involved in current subsidy policies, reforms that reduced the support provided, ensured that those subsidies that could be justified are well-targeted, and made better use of the resources saved, could make a major contribution to the promotion of sustainable development.” (CTE, 1999, p.2)

This suggests that CTE should examine existing subsidies from this point of view. It is interesting to note that Australia did not rule out the possibility that some environmental subsidies might be justified.

2.2 International Actions, Rio Declaration, Agenda 21, and Winnipeg Principles

The Rio Declaration resulting from the United Nations Conference on Environment Development emphasized the global importance of striving for sustainable development and Agenda 21 set out measures that should be implemented in the 21st century for achieving this goal. In pursuit of this goal, it recommended that all nations and levels of government draw up agenda to achieve this goal. China was one of the first nations to draw up such an agenda (State Council, 1994), even though some doubts have been expressed about China’s ability to put this agenda into practice (Tisdell, 1997b).

But many environmental and sustainability issues cannot be settled at the national or local level. They are international and often global in nature. With this in mind the Rio Conference resolved that an international body be established to promote international measures to achieve sustainable development, for example, by making recommendations to

bodies such as the WTO. To this end the International Institute for Sustainable Development (IISD) was established in Winnipeg, Canada. However, it is purely an advisory body. So its influence on global policy is limited or is at best indirect.

IISD has drawn up a set of principles, the Winnipeg Principles, for trade and sustainable development. The Seven Winnipeg Principles (as set out in International Institute for Sustainable Development, 1995, also in von Moltke, 1995) are as follows:

1) Efficiency and Cost Internalization.

Basically, this principle is that efficient pricing should be promoted and in particular a “high priority should be attached to accurate cost internalization in accordance with the ‘polluter pays principle’ and through reduction of price distorting trade barriers”. It does not, however, seem to recognize that in some cases environmental subsidies might be justified.

2) Equity

This principle is that there should be an ‘appropriate’ “distribution both within and between generations of physical and natural capital, as well as knowledge and technology”.

3) Environmental Integrity

This principle appears to imply a preference for conserving ecological systems and cultural and historical assets independently of narrow economic considerations involving internalization of externalities. It is stated that “ Many of these aspects of the environment have values that cannot be adequately captured by cost internalization, highlighting the need for other policy instruments. Such special conservation measures may represent an important exception to normal trade rules, whether in the context of trade agreements or environmental agreements. They may take the form of trade bans or quantitative restrictions. While such measures could include unilateral trade restrictions, they should nonetheless be enacted within the context of internationally agreed criteria”.

4) Subsidiarity

This recommends that action be taken at the lowest jurisdictional level consistent with effectiveness.

5) International Co-operation

Basically this suggests that sustainable development requires strengthening of international systems of cooperation so that they simultaneously and holistically encompass environment, development and trade policies.

6) Science and Development

While recognizing the value of sciences, this principle also recognizes that scientific uncertainty exists and that it can be rational to adopt a precautionary and adaptive approach to trade and development.

7) Openness

“Openness comprises two basic elements: first, timely, easy and full access to information for all those affected; and second, public participation in the decision-making process.”

While these principles as a whole seem to be desirable, there is little evidence that they have had any significant impact on WTO. Partly this may be because these principles are not as yet all operational and it may prove difficult or impossible to achieve all principles simultaneously. To what extent, for example, should efficiency be forgone for equity or for environmental integrity when such a trade-off is necessary. Nonetheless, IISD is raising concerns that WTO seems to have ignored or avoided.

2.3 Challenges to GATT-WTO's basic theory and to its approach to environmental protection

In general, GATT-WTO has taken the position that policies regulating international trade and investment, especially national policies should not be used to achieve environmental objectives. In particular, it opposes unilateral trade sanctions imposed by one country because this country objects to environmental consequences of economic activity in countries from which it imports. This is, for example, illustrated by the dolphin-tuna case mentioned earlier, WTO prefers environmental issues to be resolved by multilateral agreements. It may also prefer that trade and investment sanctions be not part of the penalties for non-compliance with such agreements.

Nevertheless, an importing country can restrict imports if importation is liable to give rise to unacceptable health and environmental risks for it, provided it has a sound scientific basis for doing so. Furthermore, nations can ban the import of commodities listed under CITES (Convention on International Trade in Endangered Species). Yet a nation does not have a general right to discriminate in trade against a nation which fails to fulfil its obligations under an international environmental convention or agreement. Today, many multilateral or international environmental conventions or agreements have weak possibilities for enforcement. Stronger mechanisms for enforcement may need to be considered in the future, including the possibility of trade sanctions against violating nations, if, for example, they are found to be at fault by an international tribunal, or similar body.

Global environmental spillovers of various kinds result in many of the environmental effects of economic activity within a country having consequences beyond that country. This is not only true for example for greenhouse gas emissions but applies also to biodiversity loss or to loss of cultural and historic relics. From this point of view, economic activity in a nation having adverse consequences on such assets may be of global concern. This has not as yet been adequately allowed for in the theory and policies adopted by WTO.

According to Halle (2000), WTO has failed to come to terms with the objective of sustainable development. This is probably because it has relied for most of its policy underpinnings on neoclassical or orthodox economic theory.

Halle (2000, p.6) states:

“One problem is that the WTO has never been clear about the goal that trade liberalization is intended to reach.... If the goal is economic growth of the GDP kind, WTO will not win broad support. The goal must be wider. The time is right for WTO to articulate its end-purpose. Sustainable development would link WTO with many other international processes, but more important it would provide a

basis for developing filters [for policies] in the absence of which the WTO is flying blind”.

WTO has followed a compartmentalized or partial approach to trade policy. It has concentrated on economic efficiency and growth objectives leaving others to take care of environmental and sustainable development dimensions. But such an approach in the long run is unlikely to be effective. Greater integration of global objectives is desirable. The inability of WTO to address the need for such integration has been a matter for considerable concern globally.

2.4 The future development of WTO in field of trade and environment

There is clearly considerable opposition to the outlook, procedures and policies of the WTO, as well as to those of some of the other Bretton Woods institutions. The extent of this dissatisfaction became apparent at the Seattle meeting.

2.4.1 Different views and Seattle Meeting

There appears to be social anger about the inability of WTO to integrate its policies and its outlook with global desires for environmental protection and sustainable development. To many, it seems that WTO has adopted an ostrich-like approach. Halle (2000, 0.7) comments:

“Hearing the WTO repeat like a mantra that trade liberalization is good for the environment, good for the poor, good for development, indeed just plain good was grounds enough of the Seattle riots. It has long been clear that trade liberalization can be good for sustainable development but only provided that trade, development and environment policies are harmonious and mutually supportive. By and large they are not, with the result that trade liberalization has undermined development objectives and damaged the environment.”

Achieving such harmonization will not be easy. However, that is not a reason to avoid searching for mechanisms which will at least provide some degree of harmonization or balance in the pursuit of these different objectives. WTO and similar international bodies

need to consider the institutional structures and procedures which are likely to enhance their performance in this regard in the future.

The Seattle WTO meeting brought into the open conflicts about policies being pursued by the WTO. Sources of the conflicts expressed on this occasion are complex. Views expressed represented varying degrees of 'self-seeking' and 'ideal-seeking' behaviour. Conflicts were present both between interest groups in countries and between countries.

In general, the higher income countries of the EU and Japan favoured more environmental concessions and a larger role in relation to the environment for the WTO with the position of the USA being ambivalent. For example, the USA supported the G8 position in relation to the importance of the WTO taking greater account of environmental issues but on the other hand, as a member of the Cairns group, it also supported the position of this group opposing the linking of trade, environment and labour issues. The ambivalence of the US government, along with considerable conflict between interest groups in the US about this matter, may well have been a significant factor leading to the failure of the Seattle Round. Also, the supposed intransigence of the Cairns group was seen to be a contributor (Halle, 2000). The Cairns group's opposition was based on the fear that environmental factors would be used as a reason for continuing substantial subsidies and economic support for agriculture in the EU and Japan. Many of the developing countries had similar fears. In particular, India opposed the inclusion of environmental norms and labour norms in revised policies of the WTO, mainly on the grounds of self-interest. A number of the views expressed by pressure groups and by less developed countries in relation to these issues are set out in Tisdell (2000b).

Given, however, the strength of environmental concerns and political realities in the EU and Japan, it seems desirable to reach a compromise position which makes some progress towards achieving the goal of sustainable development. One needs to search for politically acceptable processes which will move nations closer to this goal.

It needs, for example, to be recognized that not all subsidies for environmental protection are socially or economically unwarranted. In some cases also, such policies may actually reduce exports e.g. agricultural export, especially where income support switches from production subsidies to environmental subsidies.

2.4.2 Major issues

A major issue as far as the Cairns group is concerned (and presumably many LDCs) is that environmental supports not be used as means to subsidise economic production. The matter is greatly complicated by the fact that environmental spillovers or externalities are difficult to measure and opinions about their non-market valuation can vary considerably between individuals and nations. Thus, for example, should a subsidy be provided to Japanese rice-farmers on the basis that their method of rice production is environmentally friendly and if so, what level of subsidy is justified? Or should farming be subsidised in Sweden on the basis that open agricultural land as opposed to forest has a favourable psychological impact on the well-being of the Swedes? To what extent are environmental subsidies to agriculture justified on the basis that in certain localities they preserve landscapes which encourage tourism?

A major issue also is the enforceability of international environmental agreements and conventions. There appear to be few effective means in place to enforce these. Trade sanctions in the future will have to be considered as a means of enforcement and due international processes established to make that possible.

2.4.3 What should WTO do to coordinate trade, environment and development in the near future?

First of all it must be recognized that the coordination problem is not just the responsibility of the WTO. However, the WTO has an obligation to at least be sympathetic to the possibilities for such integration. Parties in negotiating international agreements, conventions and protocols should take into account WTO's role in relation to these. Cross-institutional committees within WTO may be established to assist coordination where WTO has a role, as might normally be the case. This is akin to Halle's (2000) suggestion

that “frontier commissions be set up to examine the interface between the different policy areas”.

More attention in the research of WTO should be given to examination of policies to foster harmony between trade, development and environment policies. The scope and impacts of other than polluter-pays environmental policies in relation to agriculture other industries should be investigated e.g. environmental subsidy policies, because it does not seem to be politically feasible in many higher income countries to abolish income supports for agriculture quickly. This possibly is also so for other ‘life style’ industries as well.

While the Winnipeg principles provide some guidance to WTO for policy development, they are to a considerable extent open-ended. Nevertheless, they are worthy of serious consideration. Possibly the main problem with these principles is that they try to prescribe an ideal, an ideal which is probably unattainable in the foreseeable future.

The way forward at this time may be to develop minimalist principles for environmental protection and sustainable development, in much the same way as the ILO has done for labour. These principles, however, possibly need to be developed by a new international body consisting of representatives from major international institutions with a stake in this area, including the WTO. The WTO would need to modify its approach in line with these principles, as would other international bodies. China, after it joins WTO, could play an important role in bringing about such changes.

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