

***OF CHIPS, FLOPPY DISKS AND GREAT TIMING:  
ASSESSING THE INFORMATION TECHNOLOGY AGREEMENT***

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## I. INTRODUCTION

The information technology (IT) industry, which spans activities as diverse as computers and office machinery, consumer electronics and communications equipment, electronic components, as well as a wide variety of computer and communication-related services, lies at the heart of the far-reaching changes that are transforming nations' industrial, technological and societal landscapes. In the process, the industry is assuming a central facilitating role in the globalisation of the world's economy. There are probably few examples of an industry whose products and services are so vital to every other goods- and service-producing industry. Widely recognised as holding the key to countries' growth and development prospects, IT industries tend not surprisingly to arouse considerable interest among public and private decision-makers in developed and developing economies alike.

Trade policy has not been immune from such interest. Quite the contrary, and for two main reasons. A first reason owes to the growing importance of IT industries in their own right, whether in terms of employment, innovation, technology diffusion, skills upgrading, foreign direct investment, capital formation or exports. Trade in IT products has registered explosive growth in recent years, significantly outpacing the growth observed in overall merchandise trade. The value of office and telecommunications equipment exports, which stood at \$626 billion in 1996, grew by 13 percent a year on average during 1990-96, the fastest growth of all major product categories in world merchandise trade.<sup>1</sup> Such trade is expected to reach \$800 billion by the year 2000.

The growth in IT exports has fuelled significant changes in the industry's relative share in total merchandise trade. For instance, the share of office and telecommunications equipment (which is only one -albeit the most important- sub-category of an IT industry that encompasses a broad range of goods and services), nearly doubled during the 1984-96 period, from 6,5% to slightly above 12 percent. This share places office and telecoms equipment exports on par with agriculture in total goods trade, and well ahead of automobile products' 9.2 per cent share, or of iron and steel, textiles and clothing exports, the *combined* share of which amounted to 8.8 per cent at the end of 1996 (see **Table 1**).

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<sup>1</sup> World Trade Organisation, 1997, *Annual Report 1997*, Volume 1, Geneva: World Trade Organisation, pp. 12-13.

**Table 1. World merchandise exports by product, 1996**

(Billion dollars and percentages)

	<b>Value</b>	<b>Share</b>
All products	5115	100,0
Agricultural products	586	11,5
Mining products	574	11,2
Manufactures	3750	73,3
<i>Office and telecoms equip.</i>	626	12,2
<i>Chemicals</i>	474	9,3
<i>Automotive products</i>	470	9,2
<i>Clothing</i>	163	3,2
<i>Textiles</i>	150	2,9
<i>Iron and Steel</i>	141	2,7

Source: World Trade Organisation (1997).

A second reason for heightened trade policy interest in the sector can be traced to a growing appreciation of the intermediary nature of many IT products - i.e. their central (and service-like) enabling role - and of the economy-wide benefits likely to stem from improved access to a broadened array of competitively priced IT inputs. Longer held in North America and Japan, which have traditionally maintained lower levels of border protection in the sector, such an appreciation is of more recent vintage in Western Europe and Southeast Asia, the two other main producing regions. Once this occurred, however, and a consensus emerged among a critical enough mass of IT producing nations over the superior overall benefits of tariff-free trade in IT products, the “atmospherics” required for major trade liberalising initiatives improved noticeably.

Seen in this light, it is perhaps less than fully surprising that the last year witnessed the successful completion of two landmark agreements in the World Trade Organisation (WTO): the Information Technology Agreement (ITA), reached at the WTO’s inaugural Ministerial gathering in Singapore in December 1996 and which provides for the elimination of tariffs on a range of IT products by the year 2000; and the February 1997 agreement liberalising the provision of basic telecommunications services. There is little doubt that ITA-related liberalisation will serve to reinforce the pro-competitive gains flowing from the ongoing deregulation in national telecommunications markets.<sup>2</sup> More generally, the ITA and the telecoms agreement can be seen as strongly complementary of each other, marking the willingness of signatories to harness the full potential of the ongoing IT revolution and help speed along the fuller deployment of the global information

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<sup>2</sup> See François, J. and B. McDonald (1996), *The Multilateral Trade Agenda: Uruguay Round Implementation and Beyond*, Staff Working Paper RD-96-012, Geneva: World Trade Organisation, (November).

infrastructure.

This paper limits its focus to the ITA, and explores the agreement's origins, effects and prospects. The paper is structured as follows. Section II briefly describes some of the salient characteristics of the IT sector, focusing in particular on some of the economic and commercial dimensions at stake. Section III focuses on the origins of the ITA by tracing its negotiating history. The analysis suggests that the ITA was both a timely and well packaged extension of work left over from the Uruguay Round. Section IV attempts a critical examination of the Agreement's core features. Section V concludes by focusing on a range of outstanding issues and on the outlook for future negotiations on IT-related matters. In particular, the section discusses whether the ITA heralds the beginning of a new era of continuous, sectoral negotiations in the WTO.

## II. WHAT'S AT STAKE? STYLISED FACTS OF THE IT INDUSTRY

### A. *The Economic Importance of the Sector*

The information technology sector has become a key driving force of economic growth during the past decade. It is currently the world's fastest growing industry. Global output in the sector reached \$1 trillion in 1996.<sup>3</sup> In the key markets of computers, semiconductors and software, the US and Japan are the world's leading producers. The EU lags behind the US and Japan in these markets but is relatively competitive in the field of scientific instruments and selected telecoms equipment like handsets, switching equipment, and fibre optic cables.

The computer, software and communications industries have been growing over the past few years at a pace far exceeding that observed in the rest of the economy. In fact, high-tech industries like IT have replaced the traditional cyclical industries as the main driving force for sustained economic growth in the OECD region. For example, a stunning 33% of US GDP growth in 1996 found its origin in information-technology industries, propelled by activities ranging from the Internet boom to the rise of direct-broadcast satellite television.<sup>4</sup>

The US and the countries of Asia (including Japan) are the best performers in this market. US firms dominate the world market for software and have maintained uncontested leadership in the design and sales of operating systems and packaged software. According to International Data Corporation estimates, the US holds about three-quarters of the world software market, compared with 20% for Europe and 4.3% for Japan.<sup>5</sup> For semiconductors, production and trade is dominated by a few American and Japanese firms. Western European producers have a marginal position, while among developing countries, Korea and Taiwan have emerged as serious competitors owing to significant capital spending in new chip-making facilities. In 1995, the share of Asian producers (excluding Japan) in the world chip market leaped to 12.1%, up noticeably from 8.9% in 1994.<sup>6</sup> While the production of integrated circuits continues to lie beyond the reach of many developing countries, the design of custom and semi-custom chips has been undertaken by many newly-industrialising countries.

Recurring concerns have been voiced in recent years over Western Europe's lagging performance in IT-related activities, the region having experienced significantly slower

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<sup>3</sup> "Information Technology Agreement", *WTO Press Brief* (27 March 1997). The IT definition used by the WTO also includes televisions and radios but excludes fibre optics and software. It is thus not necessarily identical to the definition used by individual WTO member countries.

<sup>4</sup> See "The new business cycle", *International Business Week*, 31 March 1997.

<sup>5</sup> See "Competitiveness: How US companies stack up now", *Fortune*, April 18, 1994.

<sup>6</sup> See "Saving chips from market dips", *The Economist*, January 20, 1996, p. 69.

growth in the sector compared to that in the US and Asia. Since 1990, Europe's share of the world information technology market dropped from 35% to 28%. Starting from the same level, the US share has grown to 41% of the world market during the same period. Europe's trade balance in the sector has also worsened, with imports representing around 50% of consumption in a number of product categories. It is against this worsening backdrop that the EU Commission came to regard the abolition of tariffs on all IT products (and the elimination of non-tariff barriers in the EU's main trading partners) as an important means of strengthening the sector's competitive position in Europe.<sup>7</sup>

As noted earlier, world trade in IT products totalled \$626 billion in 1996, up from \$350 billion at the beginning of the 1990s. Such trade, which is expected to reach \$800 billion by the year 2000, is already larger than world exports of agricultural, mining or automobile products.<sup>8</sup> Japan, the US, the EU, Singapore, Korea, Malaysia and Taiwan (Chinese Taipei) make up the bulk of trade (imports and exports) in the sector (see **Table 2**). The Quad members account for a combined 55% of world trade, half of which from the US alone.<sup>9</sup> Despite its global leadership in production, the US runs an overall trade deficit in IT products. In 1996, US imports totalled \$179 billion, while US exports reached \$136 billion, resulting in a trade deficit of \$43 billion.<sup>10</sup> This represented 32 percent of the country's merchandise trade deficit in 1996.<sup>11</sup> The EU-15 exported some \$167 (of which \$65 billion were directed outside the Union) billion worth of office and telecommunications equipment in 1996. With total imports of \$182 billion (\$104 billion of which from outside the region), the EU ran a \$15 billion deficit in the sector that year. The region's external deficit (i.e. that registered on trade with non-EU countries) stood at \$40 billion at the end of 1996. Among the Triad (US, EU and Japan), Japan is the sole net exporter of IT products, the country's surplus standing at some \$51 billion at year-end 1996. Among regional groupings, the 18-member Asia-Pacific Economic Co-operation (APEC)<sup>12</sup>

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<sup>7</sup> This view is put forward in a European Commission paper on Information and Communications Technologies presented to the Industry Council in April 1997. See *Europe*, No. 6961, 24 April 1997, p. 10.

<sup>8</sup> Figures from "Senior US Official's Briefing on ITA and APEC", USIA, Nov. 25, 1996, [www.insidetrade.com/sec-cgi/as\\_web.exe?SEC\\_world2+D+541470](http://www.insidetrade.com/sec-cgi/as_web.exe?SEC_world2+D+541470).

<sup>9</sup> Exports of IT products support some 1.8 million US jobs.

<sup>10</sup> USITC, (1997), *Advice Concerning an Information Technology Agreement and Modification of Duties on Distilled Spirits*, Publication 3031, (April), pp. 1-2.

<sup>11</sup> As noted in USITC (1997): "a large portion of the European and, especially, US trade deficit for electronic products is due to the global interdependence of the industry. In today's global IT market, manufacturers rely increasingly on internationally-sourced components, foreign production and sales facilities, and strategic joint ventures to enhance their competitive positions. A typical personal computer designed and manufactured in the United States, for example, may contain a floppy disk drive from Japan, a display monitor produced in Korea, a motherboard from Taiwan, and a hard disk drive manufactured in Singapore." Therefore, while the size of the US or EU trade deficits in IT products- both of which exceeded total Japanese imports in 1995- may carry strong emotive appeal, it bears recalling that suppliers of IT components may often be overseas subsidiaries of US- or EU-based or headquartered firms.

<sup>12</sup> APEC comprises the US, Japan, China, the Philippines, Brunei, Thailand, Indonesia, Malaysia, Singapore, Hong Kong, Taiwan, New Zealand, Australia, Canada, Papua New Guinea, Korea, Mexico and Chile.

grouping is by far the leading exporter, accounting for 80% of world trade in IT products.<sup>13</sup> Asian economies are the leading producers and exporters of many general electronic items, especially consumer electronic products. But they are also big importers of software, high-end microchips, as well as advanced telecoms equipment.

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<sup>13</sup> This figure includes consumer electronics.



**TABLE 2. Leading Exporters and Importers of IT products,  
1996**  
(in \$ billion)

<b>Leading exporters</b>		<b>Leading importers</b>	
United States	104.62	United States	140.66
Japan	93.93	European Union (extra-EU imports)	104.32
European Union (extra-EU exports)	64.69	Japan	43.35
Singapore (domestic exports)	42.35	Singapore (retained imports)	22.30
Chinese Taipei	35.50	Malaysia	23.97
Malaysia	34.89	Canada	20.51
Korea	31.87	Korea	18.93
China	17.20	Chinese Taipei	18.76
Mexico	13.02	China	13.94
Canada	12.33	Hong Kong (retained imports)	11.95
Total of above	450.40	Total of above	418.95

Source: World Trade Organisation (1997).

### ***B. The Key Role of Electronics in Ushering in the “Global Information Society”***

Information and communications technologies are essential building blocks for the “global information infrastructure”, itself a crucial tool in helping transform countries’ industrial and social structures so as to reap the benefits of the so-called “Global Information Society”. Enhanced access to higher quality health care services, greater educational opportunities, and improved business and manufacturing efficiency, will be among the benefits from this transformation. While OECD and newly emerging countries are racing towards the information society, many developing countries are lagging far behind, and just beginning to recognise the importance of the IT revolution for their economic development. For instance, telecommunications and financial infrastructures are still very poor in most developing countries compared to those found in developed countries. Nevertheless, for developing countries, IT products and services will play a key role in developing activities such areas as tourism, transport and financial services, and will perform an equally central social function by bringing advances in health and education.

The increasingly important role played by IT products in the economic transformation described above explains some of the shared interest of countries in achieving greater liberalisation of trade in the sector. The convergence of information, communication and computer technologies differs from previous technological revolutions,

both in the speed of transformation it allows and the pervasiveness of its impact, not only on manufacturing but, for the first time in economic development, on many service industries (including governments). As one observer recently put it, there is a plausible case for the claim that the information and communication technology revolution is “the biggest technological juggernaut that ever rolled”.<sup>14</sup>

To be sure, there are other important sectors, such as automobiles or chemicals, where the average tariff level maintained by industrial countries is also relatively low and where a complete phase-out of tariffs might well be possible (though free-rider concerns in autos would in all likelihood prove insurmountable). However, such sector-specific initiatives have not to date gained much support. The success of the ITA is therefore somewhat unique, and owes in no small measure to the special “enabling” characteristics of IT noted earlier. Such characteristics greatly enhance the economy-wide appeal of liberalisation in the sector, offer potential benefits to all participants in the negotiations and make it much more difficult in political economy terms to mount credible protectionist “resistance” campaigns. Removing obstacles to free trade in electronic products will help ensure that the building blocks of global information infrastructure can be procured at the lowest possible cost in a more fully contestable market. Governments of industrial and developing economies alike have, not surprisingly, come to realise that the economy-wide costs associated both with high tariffs on key products and a range of non-tariff measures, can only retard the development and diffusion of new information technology products and service offerings. Liberalisation of world trade will therefore benefit not only domestic producers of IT products but also boost the competitiveness of all IT users (big or small), be they automobile producers, airlines or financial service providers.

### ***C. Expected Benefits***

The Institute for International Economics recently estimated that consumers world-wide could realise annual savings worth some \$50 billion as a result of the ITA, owing to the downward pressure on prices of computers and other electronic equipment and software that should flow from the Agreement.<sup>15</sup> The beneficial effects of the ITA are likely to be magnified by the dynamic gains flowing from lowered telecommunications prices that will result from the WTO’s April 1997 agreement on telecommunications services.

It is generally felt that the US and Japan, the world leaders in IT, stand to gain most from the ITA as they secure enhanced access to previously sheltered markets while experiencing little if any change in access to their respective domestic markets. With a few

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<sup>14</sup> See Sylvia Ostry (1997), *Globalisation and the Nation State: Erosion from Above*, PRIME Lecture, University of Ottawa, Canada, (April), p. 5.

<sup>15</sup> See “Consumer Group Recommends Items for ITA”, *International Trade Reporter*, November 27, 1996, p. 1830.

prominent exceptions, tariffs in the US and Japan (as well as Canada) would have remained very low (or zero) even in the absence of an ITA.

An assessment of the Agreement carried out by the US International Trade Commission concludes that the ITA will likely liberalise access to the US market in only a few areas (primarily foreign electronic components, specifically capacitors and resistors, and certain telecoms equipment), where US tariffs are fairly high. Pre-ITA US tariffs were relatively low for most other IT products, so that their elimination should not dramatically alter the contestability of the US market.<sup>16</sup> Even less change in market access conditions is expected in the Japanese market, since the country's post-Uruguay Round tariffs on most IT products (to be fully implemented by 1 January 1999), are zero. The Japanese IT industry will, however, benefit from improved access to foreign markets, notably through the removal of the still significant tariff rates on telecommunications equipment in North America and Europe. Pre-ITA tariffs for selected telecommunications equipment stood as high as 8.5% in the US, 14% in the EU, nearly 18% in Canada, and a disquieting 72% in Switzerland.

However, countries in Europe and Asia (beyond Japan) also stand to gain, as their tariffs are higher and their domestic producers consequently secure access to cheaper imports of inputs and components. In Europe, this means that producers and users of IT will no longer have to pay around 15% more than Americans their for IT equipment. In fact, companies like Siemens of Germany have taken the position that German producers could benefit even more than their US counterparts from the agreement precisely because European tariffs and import-propensity are both high. By providing EU firms with competitive conditions more in line with those applying in the markets of their main rivals, the tariff elimination pact could also have a positive impact on investment and employment levels in the EU. The latter benefits could indeed counter the expected slowdown in foreign direct investment activities and associated employment effects that had been the consequence of foreign companies' decisions to relocate production to Europe in order to circumvent the relatively high EU import duties in the sector. Still, there is little doubt that the ITA will heighten competitive pressures on those firms, notably in Western Europe, that have experienced greater protective shelter.

Despite the above transition costs, the ITA stands to generate significant welfare gains for European consumers. Such benefits have been estimated at some 5 billion ECUs (\$5.4 billion dollars)<sup>17</sup> The ITA's overall positive effect on Europe is expected to exceed that for the US because the EU maintains higher tariffs on semiconductors and a broad range of related IT products. Exporters of electronic components, silicon wafers, office

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<sup>16</sup> USITC (1997), *op. cit.*, pp. XII and 12-3.

<sup>17</sup> "L'Europe va-t-elle libéraliser son marché aux puces électroniques?", *Le Monde*, 12 November 1996.

machines, selected telecoms equipment like handsets, switching equipment and fibre optic cables are all expected to benefit from the tariff elimination package.<sup>18</sup> For many emerging markets of Asia, the savings accruing to companies that import IT products may be greater still. At the same time, the developing countries of Asia offer some of the greatest market access opportunities for firms located in industrial countries. For instance, duties maintained on IT products run as high as 30-40% in India and Indonesia, 30% in Malaysia and Korea, between 5 and 15% in Chinese Taipei, and as much as 10% in Singapore and Hong Kong, China.<sup>19</sup>

For Australia, a major benefit lies in the ITA's potential to open rapidly growing markets in East Asia to its exports. Although Australia is a net importer of IT products (it ran a \$6.9 billion trade deficit in the sector in 1995), its exports of IT products have been growing rapidly of late. The latter stood at \$1.9 billion in 1995-96.<sup>20</sup>

It is important to note that non-Asian developing countries, the bulk of which stayed on the sidelines of the ITA, also stand to gain from the Agreement, even if they produce very few IT products or indeed none at all. The decision of many of these countries not to sign on to the ITA suggests that there is still a pedagogical battle to be fought, most notably in Latin America, on the economy-wide benefits of trade liberalisation in the IT sector. Maintaining protected home markets while other trading partners are opening up theirs and expose their IT sectors to global competition, will simply deprive the domestic economy of world-class products and domestic IT producers of incentives for keeping or catching up with the rapid pace of technology change. Nevertheless countries like Brazil, where industrial policy activism still characterises the trade policy landscape, succumbed to the siren song calling for infant-industry protection.<sup>21</sup>

The IT industry has associated other types of benefits with the exercise of eliminating tariffs on trade in the sector. Some of these benefits are intangible in nature. For example, the US industry argued throughout the negotiations that achieving tariff-free trade in the sector would eliminate or help address other trade-related problems, particularly regarding rules of origin and customs determinations. Furthermore, a tariff-freeing regime could be designed in such a way as to ensure that new IT technologies would automatically be bound at "free", (i.e. be subject to a zero tariff).<sup>22</sup> Finally, such an agreement would

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<sup>18</sup> USITC (1997), *op. cit.* p. 12-3.

<sup>19</sup> *Ibid.*, Table 12-1, pp. 12-2 and 12-4.

<sup>20</sup> Trade outcomes and objectives statement, Commonwealth of Australia, February 1997, p. 171.

<sup>21</sup> The attitude of Argentina and Brazil towards the ITA may also have been dictated by tactical negotiating considerations aimed at providing both Mercosur partners with needed leverage vis-à-vis the US in looming free-trade negotiations within the Hemisphere (i.e. the FTAA) and in the next round of WTO negotiations (partly in anticipation of EU intransigence on agriculture).

<sup>22</sup> See "ITI Proposal for Tariff Elimination", reprinted in *Inside US Trade*, March 3, 1995.

decrease the administrative burden weighing not only on industry but also on governments themselves, as the elimination of tariffs would result in the disappearance of a considerable part of the cumbersome administrative procedures and institutions connected with the collection of duties, customs quotas, inward/outward processing, GSP-rules etc. For certain products and countries, applied tariffs are so low that administrative costs widely exceed collected duties.

#### ***D. The Legacy of the Uruguay Round***

The seeds for launching the negotiations culminating in the ITA were sown in the Uruguay Round, which in effect established a pattern for duty-free trade on a sectoral basis. During the tariff reduction exercise of the Round, Japan had argued for a comprehensive elimination by developed countries of tariffs for manufactured goods. Deferring to its industry advisers, the US argued instead for duty-free trade in a number of sectors where its firms enjoyed greatest competitive strengths.<sup>23</sup> For its part, the EU favoured a formula-based approach (i.e. across-the-board tariff cuts in specific sectors), particularly in those sectors where the US and other key trading partners maintained significant tariff peaks (e.g. high-end apparel, distilled spirits, glassware). As private-sector interest grew for eliminating tariffs on a sectoral basis, the “zero-for-zero” approach - involving complete sectoral tariff elimination conditional on other trading partners doing the same - gained grudging acceptance.<sup>24</sup>

Late in the Round, there was talk of applying the zero-for-zero approach to electronic products, but this was resisted by the EU, who felt that its main suppliers, Japan and the US, would first have to offer greater “concessions” in other areas of the negotiations. The final tariff accord of the Uruguay Round involved the elimination by Quad countries of tariffs for most pharmaceuticals, construction and medical equipment, agricultural machinery, steel, beer, distilled spirits, paper, toys, and furniture. Most other OECD countries also eliminated or bound their relatively low tariffs in the above sectors, whereas developing countries agreed in most instances to make binding commitments at - and often substantially above - applied tariff rates. All in all, the zero-for-zero approach produced a surprisingly large end-result among OECD countries. It also probably set a precedent for future negotiations.

By the time the curtain fell on the Uruguay Round in December 1993, major industrial countries agreed to tariff cuts of about 50% or more for segments of the electronics sector (excluding consumer electronics products). In particular, the EU agreed to reduce its tariffs on computers from 4.9% to 2.5% over 5 years, and on computer parts

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<sup>23</sup> The US pharmaceutical sector was the first to consult with European and Japanese counterparts and to reach a consensus that duty elimination by all was desirable.

<sup>24</sup> Ernest H. Preeg, *Traders in a brave new world*, University of Chicago Press, 1995, p. 133.

from 4% to 2% during the same period. The US agreed to reduce its tariff on computers from 3.9% to 1.9%. In the case of semiconductors, the EU agreed to cut tariffs from an average 14% to an average 10%, while maintaining duties on a number of chips at the 14% level. The US agreed to bind its semiconductor tariff at free (its applied rate was already zero), while Japan and Canada agreed to eliminate and bind at zero tariffs on all computers, computer parts and semiconductors.

The US would have liked tariff cuts in certain areas, such as semiconductors and computer parts, to go deeper, but the EU, under pressure from large European semiconductor manufacturers such as Siemens, Thomson and Philips, refused to go along. The result of the Uruguay Round's tariff cutting exercise was that, after implementing their respective commitments, the US and Japan had comparable tariff levels in the electronics sector. By contrast, duties maintained by the EU continued to be higher for a number of electronic products. Most developing countries would also maintain significantly higher tariff levels.

Although it was not possible for the key industrial-country suppliers of electronics products to reach the goal of reciprocal tariff-free trade by the end of the Uruguay Round, the fact that the sector had been considered for a zero-for zero approach, and that some "down payment" by way of tariff cuts had been secured, suggested that the initiative might be worth pursuing once another opportunity for tariff negotiations presented itself. The run-up to the WTO's first Ministerial meeting in Singapore in December 1996 would provide such an opportunity.

Indeed, while there was concern that the Uruguay Round may have produced "negotiating fatigue" among participants that would inhibit resumed negotiations for some years to come, the major trading partners were also interested in maintaining some kind of post-Uruguay Round liberalisation momentum. The challenge was to identify areas of mutual interest and minimum sensitivity, within the parameters of the limited US negotiating authority provided by the Uruguay Round Implementation Act. Specifically, the Act extended to the President proclamation authority for setting tariffs at levels within the range that the US had proposed during the Uruguay Round. Since the US government had proposed zero tariffs for, *inter alia*, computer hardware products, semiconductors and integrated circuits, and computer software, any multilateral negotiation seeking to reduce or eliminate duties in these areas would be covered under that provision. Beyond IT products, US negotiating authority extended to a limited number of other products, such as distilled spirits, non-ferrous metals, oilseeds and oilseed products, and pharmaceuticals.

Following the bruising battles over Congressional passage of the North American Free Trade Agreement and the Uruguay Round, and coming in the context of the more

general *malaise* in US political circles over the alleged sovereignty-impairing effects of trade liberalisation and multilateral diplomacy, the US preferred to pursue a narrower liberalising agenda. The dynamism and “feel good” public recognition of the IT sector -- and its commercial priority -- meant that the idea of repackaging and expanding the Uruguay Round’s sectoral zero-for-zero proposal for electronics products was newly attractive to other Quad countries. These factors contributed in no small measure to making the ITA the prime candidate to spearhead the new sector-specific approach the US now favoured (alongside related negotiations on basic telecommunications services). This approach, it was posited, would render obsolete the need for all-encompassing negotiating rounds and the strong doses of political capital required to sell them to increasingly sceptical domestic constituencies. The paper returns to this issue in its concluding section.

### III. NEGOTIATING HISTORY

#### A. *Laying the Groundwork*

The ITA started out as a private-sector initiative in the US, which quickly received the backing of industry counterparts in Europe and most other industrial countries. In late 1994 and early 1995, the US-based Information Technology Industry Council (ITI), the European Association of Manufacturers of Business Machines and Information Technology Industry (EUROBIT), and the Japanese Electronic Industry Development Association (JEIDA) jointly developed recommendations for the G-7 Ministerial Conference on the Global Information Society that took place in Brussels in February 1995. One of their key recommendations was for the leading industrial countries to negotiate the complete elimination of customs duties by the year 2000, or sooner, on products that formed an essential basis for the realisation of the Global Information Infrastructure.<sup>25</sup> Taking the conceptual lead, the US industry proposed that a broad product spectrum of information technology products be covered by such an initiative:

- computer hardware products, including peripherals and parts
- computer software
- semiconductors and integrated circuits

The US industry wanted to avoid GATT-type drawn-out negotiations. It was hoping that the US, together with other leading industrial countries, would be in a position to launch negotiations in 1995 and that a final agreement could be ready in time for the WTO’s first Ministerial meeting, held in Singapore in December 1996.<sup>26</sup>

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<sup>25</sup> See USITC (1997), *op. cit.*, p. 1-3.

<sup>26</sup> See “ITI Proposal for Tariff Elimination”, reprinted in *Inside US Trade*, March 3, 1995.

Recalling the EU's negative reaction to a similar proposal made during the Uruguay Round, the US administration was initially reluctant to consider the US industry proposal unless strong support was clearly forthcoming from manufacturers located in Europe. Economic conditions combined with a growing awareness of the vast market opportunities which the "information economy" was opening up, created a favourable negotiating environment in Europe as well. While European computer makers were not doing too well, high demand and prices had created buoyant market conditions for European semiconductor manufacturers. The latter thus signalled greater flexibility with respect to tariff reductions for chips, something they had been strongly opposed to only a year earlier at the conclusion of the Uruguay Round.<sup>27</sup> The unusual lack of opposition voiced by private-sector groups - with the exception of some producers of specific products - undoubtedly contributed to the success of this negotiation.

The initiative gained momentum in the context of broader transatlantic discussions aimed at removing remaining obstacles to US-EU trade in goods and services. In their joint recommendations for the US-EU summit meeting in December 1995, US and European business leaders participating in the Transatlantic Business Dialogue (TABD) specifically mentioned IT as a priority sector for tariff elimination. Including an ITA in the TABD (along with other activities of direct relevance to the IT sector) was an important step in placing the initiative on the agenda of the US-EU summit in December 1995.<sup>28</sup> At the summit, President Clinton, EU Commission President Santer and then EU Council of Ministers President Gonzalez endorsed the initiative and announced they were launching "a specific exercise in order to attempt to conclude an information technology agreement".<sup>29</sup>

### ***B. Consensus-building Among the Quad***

The initiative was taken up next by the "Quad" group of leading trading nations - the United States, the European Union, Japan and Canada,, who began to explore the potential content and modalities of an ITA in early 1996. The idea was that a consensus among the leading trading nations could be used to enlist other WTO members to join on to an agreement.

There were many questions to address, the most important ones relating to the

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<sup>27</sup> The shift in the previous hard-line position of European semiconductor producers received an early confirmation when at the end of 1995, the EU reduced its tariffs from 14% to 7% , inter alia, on a range of semiconductors as part of an agreement negotiated under GATT Article XXIV which compensated the US for tariff increases resulting from the accession of Austria, Finland and Sweden to the Union.

<sup>28</sup> Other IT-relevant activities pursued by the TABD related to development of agreements on mutual recognition (MRAs) of conformity assessments for information and communications products and effective copyrights protection for the transmission of creative works via the Global Information Infrastructure.

<sup>29</sup> *Joint US-EU Action Plan*, Madrid, December 15-16, 1995, <http://www.cec.lu/en/agenda/eu-us/pub/tai/ap3.htm>.



products to be covered and the countries that would have to participate in order for this to become a viable multilateral agreement. It was not even clear whether the negotiation of an ITA would be a stand-alone exercise or form part of a broader exercise of tariff negotiations for industrial goods. The EU argued in favour of the latter approach on the ground that any tariff reduction agreement on IT products would have to address IT-related non-tariff measures and reduce tariffs in other sectors for it to be acceptable to EU member countries. The US sought a single-sector deal focusing solely on the elimination of tariffs.

Nevertheless, Washington felt that the Quad members should be able to agree on these and related issues relatively quickly and was the first party to circulate an informal preliminary listing of broad IT product categories which it thought should be covered by the accord. This list went beyond what the US industry had initially proposed to include also telecommunications equipment, a sector in which the EU had a particular interest, as well as such categories as semiconductor manufacturing equipment and parts, electronic resistors and media software.

Complications soon arose. With different countries seeking to exempt certain products, the question of coverage saw the US and EU locked into disputes right up to the WTO Ministerial meeting in December 1996. The only coverage-related issue settled relatively early related to the exclusion of consumer electronics.

Following internal deliberations in March and April 1996 aimed at developing a negotiating position that would be acceptable to EU member states and their industry, Brussels started to pursue far-reaching issue-linkages.<sup>30</sup> When Quad ministers met in Kobe in April 1996, the EU tied its co-operation on the ITA to a long list of controversial conditions relating, *inter alia*, to the US-Japan semiconductor agreement, non-tariff barriers to the IT market, and compensatory tariff cuts in other, non-IT, sectors.<sup>31</sup> The Commission's insistence on a comprehensive bargain producing a "balance of benefits" impeded forward progress on the ITA. Technical-level work on the ITA came virtually to a halt during the summer of 1996 because the EU refused to participate in the talks unless it was allowed to take part in the new US-Japan semiconductor arrangement being negotiated separately.

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<sup>30</sup> Unlike the US administration, which could draw on its remaining negotiating authority, the EU Commission first required a legal mandate from the member states for engaging in the proposed liberalisation exercise.

<sup>31</sup> An internal Commission briefing paper for Committee 113 discussions had argued that an ITA should focus exclusively on industrial IT products, including telecommunications products for which European producers were doing well, and have the widest possible participation beyond the US and Japan in order to open important other export markets in Asia. To obtain a "balance of benefits", Brussels should also pursue the goals of obtaining additional tariff cuts by Japan and gaining access to a future US-Japan arrangement on semiconductors.

Since the Quad would only endorse the ITA formally if the US and EU managed to settle their bilateral differences, it became increasingly questionable whether an accord would be ready for the WTO Ministerial meeting. Support for the ITA outside the Quad was also problematic. US officials became increasingly nervous, not only accusing the EU of holding up the ITA by insisting on its involvement in the semiconductor pact but also warning that an agreement could not be finalised at the Singapore Ministerial unless Quad members firmly endorsed it at next meeting in Seattle on September 26-28. The Seattle meeting eventually turned into what EU Trade Commissioner Sir Leon Brittan termed the “logjam breaking Quad”. On the fringes of meeting, the US and EU finally brokered a compromise on semiconductors (US-EU tensions would resurface again later over the interpretation of the statement settling the dispute), which allowed the resumption of the ITA negotiation.<sup>32</sup>

Subsequent talks at the technical level made progress on outstanding issues. There were still major disagreements over product coverage, but in early November senior US trade officials described the talks as “moving quickly” and an agreement being “relatively closely at hand”.<sup>33</sup> By mid November, Quad members actually began to draft ITA provisions to be included in a Ministerial declaration. Meanwhile, the European Commission was in the process of seeking a formal negotiating mandate from the EU Council of Foreign Ministers, a prerequisite before it could conclude any agreement. On November 26, the EU Council authorised the Commission to negotiate the ITA “with a view to conclude a comprehensive and balanced agreement between the Community and a significant number of countries which opens markets focusing on the IT sector with a view to obtaining effective market access”.<sup>34</sup>

However, the negotiations’ final stretch proved exactly difficult. This was particularly true of the debate over product coverage, where Washington and Brussels simply could not agree on how to deal with certain product categories. In addition, both sides seemed destined for a new confrontation over the conditions of EU participation in the US-Japan semiconductor arrangement.<sup>35</sup> As the WTO Ministerial meeting approached,

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<sup>32</sup> “Understanding on Semiconductors and ITA Between the European Commission, Japan and the United States”, reprinted in *Inside US Trade*, Special Report, October 1, 1996, p.5. See also “US and EU to eliminate tariffs on IT”, *Financial Times*, September 30, 1996.

<sup>33</sup> “US, EU could agree on liberalising trade in info-tech products within days, Kantor says”, *International Trade Reporter*, November 13, 1996, p. 1729.

<sup>34</sup> “Barshefsky signals broad US flexibility on ITA product coverage”, *Inside US Trade*, November 29, 1996, p. 20.

<sup>35</sup> The new tensions arose because Brussels was contending that the agreement reached in Seattle would permit it to maintain tariffs until the end of 2000 while taking part in the semiconductor accord. This interpretation was disputed by the US, which insisted that the tariffs be removed as soon as possible and preferably by the end of 1997.

both sides were accusing each other of standing in the way of a final agreement.<sup>36</sup> Such disagreements were still unsettled when trade ministers arrived in Singapore.

### ***C. Getting Other Countries on Board***

For the Quad partners, bringing other countries into the agreement was critical to containing the ITA's potential "free-rider" problem, whereby WTO Members not parties to the agreement would benefit from tariff reductions applied on an MFN basis without making reciprocal commitments. Given the importance of the Asian region both as a market and a source of exports in the sector, it was deemed imperative to secure the participation of key countries of the region. The Asia-Pacific Economic Co-operation (APEC) forum offered a ready-made setting in which to pursue this objective (all the more so as it usefully includes China and Taiwan, two key IT-producing countries).

Non-Quad countries, and notably the developing countries, did not take an active role, on an official level at least, in the exploratory or consensus-building phase extending through the summer of 1996. Making APEC's endorsement of an ITA a high priority, the US was quick to introduce its proposal in regional discussions, but little progress was registered initially, as many non-Quad APEC members were waiting for the Quad countries group to reach agreement on the scope of the product list and other modalities so that the trade implications would be clearer. Later on, more fundamental objections surfaced. When APEC trade ministers discussed the initiative at their meeting in Christchurch, New Zealand, in July 1996, they could only agree to "take the ITA into consideration" when preparing for the WTO's Singapore Ministerial. The outcome of the meeting of APEC senior officials in Davao, (Philippines) in August, designed to prepare for the annual APEC summit meeting scheduled to take place in late November 1996, was equally disappointing. With individual members expressing reservations of all kinds, APEC could not deliver the strong - indeed unanimous - level of support the US was seeking. Several countries, including Korea, Taiwan, and Hong Kong, made it clear that the negotiating modalities had to be framed in such a way as to be acceptable to the less-developed member countries of APEC. They recalled that many such countries were not significant suppliers of those products which industrial countries had listed as priorities for coverage, thereby diluting the Agreement's potential benefit to them.<sup>37</sup> Some APEC members simply felt that the initiative was of little relevance altogether, while others were reluctant to endorse any new tariff-cutting exercise at the WTO Ministerial meeting because they thought the meeting should focus solely on the implementation of the Uruguay Round Agreements.

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<sup>36</sup> See "EU accuses US over IT deal", *Financial Times*, November 22, 1996, and "For US, EU is holding up progress on info-tech pact", *The Wall Street Journal*, November 27, 1996.

<sup>37</sup> "US says APEC backs ITA, product coverage to be discussed further", *Inside US Trade*, Aug. 30, 1996, p. 9.

For the WTO Ministerial to approve the ITA, the Quad countries thus had not only to settle outstanding differences (mainly US-EU) in their midst but also overcome the reservations of many developing countries.<sup>38</sup> As long as the leading industrial countries could not agree among themselves, other countries had little incentive to fall in line. Nevertheless, by mid October 1996, officials from the Quad countries were holding discussions in Geneva with other WTO member countries, especially leading Asian and Latin American countries in order to explore how the ITA could be made more responsive to developing country concerns.<sup>39</sup> Under pressure to broaden the agreement's country coverage, the US signalled greater flexibility on product coverage and implementation of tariff cuts, although it made it clear that there were limits to special treatment, especially for countries that were competitive producers of IT products.

Although APEC had not yet issued a formal statement in support of the ITA, there were signs of growing support within this grouping for the initiative, which some regarded as a "down payment" on APEC's own goal of free trade and investment by 2010/2020. For instance, a number of countries, such as Korea, Hong Kong, Singapore, the Philippines and Malaysia, began to circulate their own product lists. The key priority of the Clinton administration for the APEC summit was for leaders to give a strong, precise endorsement for an ITA and its conclusion at the Singapore Ministerial when they gathered on 22-25 November in Subic Bay, in the Philippines. The final outcome did not completely meet US expectations even though President Clinton and Prime Minister Hashimoto of Japan managed after strong personal interventions to get an initial version of the declaration, calling for an accord by the WTO Singapore meeting without mentioning the (US) goal of achieving zero tariffs by 2000, strengthened. The final declaration of APEC leaders stated that the ITA should "substantially eliminate" tariffs by 2000 and recognised "the need for flexibility" in ongoing negotiations in Geneva.<sup>40</sup> Cast in deliberately ambiguous language to preserve individual countries' freedom to seek exclusions and delays to protect their domestic IT industries, the statement made it plain that tough bargaining lay ahead.

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<sup>38</sup> In a proposal on product coverage and other ITA provisions circulated in October 1996, the EU emphasised that country coverage had to be as wide as possible and include besides the Quad countries Australia, Chile, China, Hong Kong, Indonesia, Korea, Malaysia, Mexico, New Zealand, the Philippines, Taiwan and Thailand (see "EU proposal envisions broad ITA coverage, including China", *Inside US Trade*, October 18, 1996, p.5-6)

<sup>39</sup> Developing country concerns were very varied. For example, Korea came forward with specific demands for exclusions from the current working list prepared by the Quad group. Thailand and other Southeast Asian countries still wanted to see some consumer electronics products included in the list, other APEC members certain non-IT products. Many developing countries were asking for flexibility on the staging of the tariff cuts. Technical-level talks on the ITA had focused so intensely on the unresolved issue of product coverage that by November 1996 negotiators had hardly begun to consider the procedural issue of how the tariff eliminations should be implemented.

<sup>40</sup> "APEC urges conclusion of ITA pact in time for WTO Ministerial meeting", *International Trade Reporter*, 27 November 1996, p. 1837.

By the time of the APEC summit, more than 30 countries were participating in Geneva-based discussions aimed at resolving open questions on product coverage, timing and exceptions for individual countries and underpin the process of drafting at least the essential elements of the ITA for the declaration to be issued by ministers at their Singapore gathering.<sup>41</sup> Such efforts continued right up to the December meeting in Singapore.

#### *D. The Singapore Deal*

The ITA became a central issue at the WTO's first Ministerial meeting in Singapore on 9-13 December 1996. The meeting opened with key unresolved issues among WTO members. Resolving such differences was viewed as critical to a successful and substantive outcome of the Ministerial meeting, all the more so that breakthroughs on several other important issues -ranging from the establishment of working groups on investment and competition policies to the intractable issues of trade and labour standards or due process in government procurement (diplomatic speak for bribery and corruption) - had yet to emerge.

Under pressure both domestically and from other WTO members to announce an ITA at the Ministerial meeting, the US and EU held intensive bilateral discussions on the margins of the WTO meeting. Their negotiators reached a provisional agreement on December 11. The accord was then approved by trade ministers of the EU (at a Council session in Singapore convened only hours later), Canada and Japan, and circulated among other WTO members. When the accord was formally unveiled on December 13 through the "Ministerial Declaration on Trade in Information Technology Products", 29 countries had signed on.<sup>42</sup>

#### *1. The Biggest "Tariff-busting Deal"<sup>43</sup> since the Conclusion of the Uruguay Round...*

At the centre of the US-EU deal reached in Singapore was a compromise on IT product coverage. The ITA would cover part of the products which had been under dispute, but not all. This meant that tariffs would be eliminated for most industrial IT products.

**Table 3** lists the main products to which the zero-tariff regime applies.

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<sup>41</sup> Attending these meetings were the Quad countries, many members of APEC as well as such countries as Norway, Turkey, Iceland, Poland, the Slovak Republic, and Argentina.

<sup>42</sup> The signatories were the US, the 15 members of the EU, Japan, Canada, Australia, Indonesia, Singapore, Hong Kong, Taiwan, Korea, Iceland, Switzerland, Norway, Turkey, and Liechtenstein.

<sup>43</sup> EU Trade Commissioner Sir Leon Brittan quoted in "25 Nations Endorse Ending Many High-Tech Tariffs", *Washington Post*, December 13, 1996, p. D2.

**Table 3. Main Products Covered by the Information Technology Agreement**

<p><b>COMPUTERS</b></p> <ul style="list-style-type: none"><li>• supercomputers, mainframe computers, work stations, personal computers, laptops;</li><li>• computer peripheral devices, including keyboards, monitors, hard disk drives, CD-ROM drives, scanners, plotters, multimedia upgrade kits;</li></ul> <p><b>TELECOMMUNICATIONS EQUIPMENT</b></p> <ul style="list-style-type: none"><li>• telephone sets, cordless phones, video phones;</li><li>• cellular phones, pagers;</li><li>• telephone answering machines, facsimile machines, modems and parts thereof;</li><li>• switching equipment;</li><li>• radio-broadcasting and television transmission and reception apparatus;</li><li>• insulated optical fibre cable;</li><li>• computer network equipment (LAN and WAN equipment);</li></ul> <p><b>SEMICONDUCTORS</b></p> <ul style="list-style-type: none"><li>• all semiconductors, including memory chips, microprocessors, ASIC;</li></ul> <p><b>SEMICONDUCTOR MANUFACTURING EQUIPMENT</b></p> <ul style="list-style-type: none"><li>• vapour deposition apparatus, spin dryers, etching and stripping apparatus, lasercuts, sawing and dicing machines, deposition machines, spinners, encapsulation machines, furnaces and heaters, ion implanters,</li><li>• handling and transport apparatus;</li><li>• measuring and checking instruments;</li><li>• parts and accessories;</li></ul> <p><b>SOFTWARE</b></p> <ul style="list-style-type: none"><li>• application-type software, multimedia software products;</li><li>• unrecorded “floppy” disks and other software media;</li></ul> <p><b>SCIENTIFIC INSTRUMENTS AND OTHER PRODUCTS</b></p> <ul style="list-style-type: none"><li>• measuring and checking devices;</li><li>• chromatographs, spectrometers, optical radiation devices, electrophorensic equipment;</li><li>• Passive and active components, including capacitors, resistors, certain electronic switches, certain connection devices, certain electric conductors;</li><li>• automatic teller machines, cash registers, calculators, electronic translators; digital still cameras and certain photocopiers.</li></ul>
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Source: adapted from WTO, *Launching of free trade in computer products to benefit everyday life of consumers and companies, says Ruggiero*, Press Release 70, 27 March 1997, <http://www.wto.org/wto/new/press70.htm>.

Other key provisions of the accord announced by Ministers were :

- ❑ tariff cuts would be applied on an MFN basis and be bound;
- ❑ tariff cuts would start on July 1, 1997 and take place in 4 stages up to January 1, 2000, at the latest;
- ❑ extended staging of reductions and, before implementation, expansion of product coverage would be allowed “in limited circumstances”;
- ❑ other customs duties and charges would be eliminated by 1 July 1997;
- ❑ regular reviews would take place with respect to product coverage and other issues relevant to this sector, including non-tariff measures;
- ❑ the ITA would not go into effect unless countries accounting for around 90% of world trade in IT products signed up by March 1997.

## **2. ... *But Not Yet a Final Agreement***

As unveiled in Singapore, the ITA was not a final deal. It required more countries to join on a broad product basis so as to reach the 90% threshold and its provisions lacked in details. According to the timetable set forth, discussions would begin in January 1997 to work out the technical details on staging and remaining issues of product coverage. Participating countries would have to submit final tariff schedules to the WTO Secretariat by March 1st. Following a review, these schedules would become binding commitments under the WTO as of April 1st, 1997, provided that participants' offers covered at least 90% of world trade in IT products.

The accord announced on December 13 had been signed by 29 countries accounting for about 85% of total trade in the sector. However, seven other countries had indicated their willingness to join in the near future (Mexico, India, Malaysia, Brunei, Philippines, Thailand, Czech Republic); if they did, the percentage of world trade covered would be over 95%. The major industry groups of the leading industrial countries had quickly

endorsed the Singapore deal, and officials from Quad countries expressed optimism that enough countries would eventually sign on. Informally, however, US officials were concerned that the whole initiative might still unravel. They noted that several trading partners that had supported the ITA at the APEC summit in November had not been among the founding members of the accord one month later in Singapore.

Apart from the need to increase the ITA's membership, the US and EU still had a number of contentious bilateral issues to resolve, notably the speed at which EU tariffs on semiconductors and certain other products that had been reclassified into higher-duty categories for customs purposes would be eliminated. Finally, although a US-EU side accord on distilled spirits sweetened the ITA for the Europeans, some EU members still appeared to be holding out for more "compensation" by the US in other areas in return for their participation in IT tariff elimination.<sup>44</sup>

### *E. Post-Singapore Endgame*

WTO members met extensively in Geneva throughout January in an effort to hammer out remaining issues of country participation, product coverage and timetables for tariff cuts.

Continued disagreement, particularly between the transatlantic partners slowed down the process of finalising the accord. Brussels let it be known that if the US wanted EU semiconductor tariffs to be eliminated prior to 2000 as the "price" of participation in the US-Japan semiconductor agreement, the US would have to do the same for some "sensitive" US products, such as photocopiers or optical fibres.<sup>45</sup> By the end of February, both sides finally reached an understanding that the EU would cut duties on semiconductors by 50% on July 1, 1997 and by 25% each at the beginning of 1998 and 1999, and the US would immediately eliminate so-called "nuisance tariffs" of 3% or lower. However, both sides failed to settle their dispute over how to deal with certain reclassified EU IT products.<sup>46</sup>

The key to a successful outcome of the negotiation lay in the broadening of the ITA's membership. For the ITA to meet the target of 90% of covered world trade, a number of "strategic" countries - Thailand, New Zealand, Malaysia and the Philippines were mentioned most frequently but India and Mexico were also targets - had to be brought on

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<sup>44</sup> France reportedly was pushing the EU Commission for additional US concessions in the separately held WTO negotiations on telecom services, and senior EU officials were telling their US counterparts informally that there was a "correlation" between the two negotiations. ("WTO Ministerial short on results but sets stage for future work", Inside US Trade, January 10, 1997, p. 14-15).

<sup>45</sup> Ibid.

<sup>46</sup> At the time the dispute over classification had become the subject of a formal US complaint in the WTO.



board. By the end of January, only New Zealand had joined, whereas more important players in the global IT market, such as Malaysia, Thailand, or India, were holding out for special arrangements that would take into account their development status or ambitions to develop IT industries of their own.

The Quad countries were unwilling to allow major changes to be made in the scope of product coverage, whether additions or exclusions. They prevailed only after having caused significant frustration on the part of many trading partners, including such countries as Norway and Australia (which had already signed).<sup>47</sup> Where the leading industrial countries were willing to make concessions to developing countries was on staging, where it was agreed that longer phase-in periods could be granted for certain products, albeit not for the entire sector.

In early March, 9 new countries, among which Malaysia, Thailand, the Philippines and even India, announced that they would join. This was a victory for the proponents of the ITA, though it was not quite complete. Trade officials were continuing some tough haggling because the US, EU and Japan were not happy with what they thought were excessively long phase-in requests contained in the draft offers of Thailand, Malaysia and India. The requests were subsequently scaled back. On March 26, 1997, almost 40 countries, accounting for 92.3% of world trade in the IT sector, met in Geneva and formally launched the ITA. A few more countries have joined since then. **Table 4** lists the countries that are participating as of October 1997. Implementation of the Agreement began on 1 July, 1997.

**Table 4. Members of the Information Technology Agreement<sup>#</sup>**

Australia	Korea	Romania*
Canada	Macau	Singapore
Costa Rica	Malaysia	Slovak Republic*
Czech Republic*	Hong Kong	Switzerland*
El Salvador*	Iceland	Taiwan^
Estonia^	India	Thailand
European Communities	New Zealand*	Turkey
Indonesia	Norway	United States
Israel	Philippines	
Japan	Poland	

# = participants as of October 21, 1997.

<sup>47</sup> By mid January, various WTO members, including Norway, Switzerland, Philippines, Australia, Malaysia, Thailand, Indonesia, were reported to force the issue by saying they would demand significant additions to the product coverage of the ITA if they were to be part of the pact by the March deadline.

\* = countries have not yet submitted their schedules and documents.

^ = Participants that are not members have to implement the commitments on an autonomous basis, pending completion of their WTO accession, and have to include these commitments into their WTO market access schedule for goods.

Source: WTO, Committee of Participants on the Expansion of Trade in Information Technology Products, *Status of Implementation*, (Note by the Secretariat), G/IT/1/Rev.1, October 28, 1997.

#### **IV. TAKING A CLOSER LOOK AT THE ITA**

##### ***A. Defining Product Coverage***

The aim of the negotiating exercise was the complete removal of tariffs. This greatly simplified the negotiations, at least in the sense that unlike earlier GATT tariff reduction rounds, negotiators were not faced with the task of first reaching agreement on the type of tariff-cutting formula that would achieve the result being sought. As such, they set out using a traditional approach of trade offers and concessions, which in the context of the ITA involved drawing up and circulating proposals for adding or deleting product categories or individual items from the Agreement's coverage. Participants ultimately agreed on a positive list of items covered by the Agreement that included both Harmonised System numbers as well as product descriptions.

To a large degree, the ITA's product coverage was a function of the exporting strengths of participating countries. Countries with strong export sectors tended towards broad coverage. For their part, countries with weaker export capabilities sought more limited product coverage. Such countries felt that their firms would not benefit greatly from more open foreign markets (unless they were significant net importers of intermediary IT products for manufacturing or re-exporting purposes) and that their domestic industry was unlikely to be enthusiastic about market liberalisation at home. In general, developing country members of APEC sought a narrower product coverage than their Quad counterparts, largely to protect their home markets from US and Japanese competitors, which they saw as gaining most from a tariff-elimination exercise in the sector. However, some of the product categories they favoured, particularly consumer electronics, were excluded ab initio from consideration by the leading industrial countries.

Both the US and the EU expressed support for the broadest possible product

coverage in the segment of industrial electronics. There was an implicit understanding among the Quad countries that exclusions had to be kept to a minimum. If any one Quad member insisted on numerous exclusions, other countries, notably in Asia, would likely do the same, potentially unravelling the entire ITA initiative. Still, reaching agreement on the product coverage proved difficult, not least because of significant differences in the way countries classify IT products for tariff collection purposes (see below). Furthermore, as in any tariff negotiation, all countries sought to have some sensitive products excluded.

### *1. Consumer Electronics*

The most glaring exemption in this regard concerns consumer electronics products, one of the three main segments of the electronics industry alongside industrial electronics equipment (including computers and communications systems) and electronic components and devices. Such an exclusion means that more than 10% of total world-wide IT production remains outside the scope of the ITA. The latter share is greater in Japan and Western Europe, where the consumer electronics industry accounts respectively for 41% and 20% of total electronics production, as compared to 8% for the US.<sup>48</sup>

The US and EU took the lead in defining the ITA's product coverage. Albeit for different reasons, both concurred to exclude the consumer electronics sector from the agreement's coverage, and focused exclusively instead on products in the industrial equipment and components segments (ranging from computers and telecom switching equipment to semiconductors). Whereas European computer makers and (albeit more reluctantly) semiconductor producers welcomed the negotiation, they were not able to persuade the European Association of Consumer Electronics Manufacturers (EACEM) to support the push for an ITA.<sup>49</sup> The EU's firmness in insisting on the exemption of consumer electronics reflected its desire to protect the remaining production in Member states by firms such as Philips from the Netherlands. This protectionist stance found its origin in the relatively high import duties maintained on consumer electronics products at the Community level. Whereas tariff protection for television sets is low in Japan and the US (who apply *ad valorem* tariffs of 4% and 5% respectively), it amounts to 14% in the

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<sup>48</sup> These figures are for year-end 1992. The consumer electronics sector includes audio and video products, the bulk of the industry's production value coming from colour television sets and VCRs. Dominant in the immediate aftermath of the Second World War, the US industry was largely displaced from the sector's audio segment during the latter part of the 1950s, and from the television segment during the 1960s and 1970s, first by Japanese producers and later by South East-Asian manufacturers. Throughout this period, the European industry retained significantly greater protective shelter, while still experiencing progressively greater exposure to foreign competition during the last two decades -- at the low end of the market from South East Asian producers, who enjoy substantial labour cost advantages, and at the high end of the market from Japanese companies. Japan, which continues to account for over 40% of total output in consumer electronics, remains by far the largest producer, followed by Korea, Malaysia and other East Asian countries. See Americo Beviglia Zampetti, "Globalisation in the Consumer Electronics Industry," in OECD, *Globalisation of Industry*, Paris, 1997, p. 211.

<sup>49</sup> See Trading in a Free World, *Information Strategy*, February 1997, p. 22.

EU.

The US did not have a comparable economic stake, as it no longer maintains a significant presence in the consumer electronics market. More problematic for the US, however, was the fact that consumer electronics were not covered by the President's residual negotiating authority. What's more, Washington saw no reason to get involved in a drawn-out fight with Brussels over products that did not play a prominent role in transatlantic trade.

As the leading producers and exporters of consumer electronics products to both Europe and the US, Japan, followed closely by the emerging countries of South and Southeast Asia, took a different view. The consumer electronics industry has played an enormously important role in the economic development of many countries in the region, enabling them to raise their share in world consumer electronics trade since the early 1980s.<sup>50</sup> Not surprisingly, Japan and other Asian members of APEC (Thailand, the Philippines, Hong Kong), favoured the inclusion of consumer electronics products in the ITA.

The decision by the Quad countries to exclude consumer electronics from the negotiations clearly diminished the attractiveness of the agreement for many developing country participants. Somewhat paradoxically, developing countries failed to mobilise support of their inclusion, in part because many of them were fundamentally wary of exposing themselves to demands for liberalising their own markets.

## 2. *Other Controversies*

As the technologies and applications of the computer, telecommunications, consumer electronics, entertainment and publishing industries increasingly converge into new multifunctional "multimedia" and "interactive" products and service offerings, the dividing lines between personal and business products are becoming increasingly blurred.<sup>51</sup> Such blurring concerns not only end-products. "Intermediate" electronic components, too, find their way into both consumer products and industrial equipment, making it particularly difficult to evaluate the international trade flows of electronics components related to the production of one or the other items. As a result, countries exhibit considerable differences in the way they classify IT products in their tariff schedules.

Such classification differences complicated the development of a list of products for

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<sup>50</sup> Zampetti (1996), *op. cit.*, p. 225.

<sup>51</sup> *Ibid.*, p. 211.

tariff elimination. The exclusion of consumer electronics from the negotiations exacerbated existing classification and definitional problems. Participating countries, especially the EU and US, spent considerable time wrangling over how to distinguish between such items as televisions (consumer electronics items) and computer monitors (industrial electronics items) or software used for entertainment and business purposes. To avoid any misunderstandings that arise from different classification practices so that signatories remove tariffs on all agreed-upon tariffs, regardless of the HS headings under which they are classified, negotiators eventually resorted to formulating a positive list of items that includes both HS numbers as well as product descriptions.

Besides consumer electronics, there were other “sensitive” products which participating countries wished to exclude. Despite an implicit understanding among Quad countries that exclusions had to be kept to a minimum, some of these requests sparked major disputes that stalled the negotiations.

Following internal discussions with domestic industry representatives, the Clinton administration decided that fibre optic cables, photocopiers, monitors, resistors and capacitors should be kept out of the tariff elimination exercise. The ensuing battle over whether or not to include capacitors became especially fierce, as US manufacturers lobbied hard to retain the US import duty of 9.6%. Even as late as March 1997, after a final deal on product coverage had been brokered, US producers of capacitors campaigned in Washington for a reversal of this decision by arguing that the survival of US companies that were vital to US national security was threatened.

The EU, which early on persuaded its Quad partners to add telecommunications equipment to the positive list of covered products, was also eager to keep certain products out. It fought hard for instance to exempt certain types of software. While Brussels was leaning toward including multimedia computers in the ITA, it wanted to ensure that such a step would not undermine the consumer electronics exemption.<sup>52</sup> For this reason, it had prepared a second, “negative” list of items which it considered “predominantly designed for consumer use. The list included such items as digital video cameras which Japan wanted to see covered by the ITA.<sup>53</sup>

By early November 1996, a draft list containing over 150 products was agreed to by

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<sup>52</sup> For example, how to classify a computer with audio and video capacities was not obvious. The US offered a definition which would count a computer as an information technology product if it can be freely reprogrammed by users, but Brussels thought it was too liberal (See “EU offers strong proposal on ITA products; US sees progress”, *Inside US Trade*, October 11, 1996, p. 4.)

<sup>53</sup> The items on the EU’s negative list included microphones and speakers, CD players, photo CD players, video cassette recorders (analogue and digital), software mainly containing games and other entertainment software, such as video films, sound or music, tv cameras, still image video cameras, audio equipment, combined VCR-TV and DVD/TV, DVD players, tv sets, satellite receivers, aerials and similar equipment.

the Quad countries, but there were still many unresolved questions. For example, the US was still not willing to surrender on capacitors, copiers and fibre optic cables. Four items that remain bracketed - digital duplicators, game machines, internet televisions and set top boxes - had been added to the “positive” (description) list at the insistence of Japan, but the EU was opposing the inclusion of products that could be considered consumer electronics. There was disagreement also on various other items, including chemical elements for use in electronics and automatic teller machines, which Japan wanted to add, as well as copper cables and certain semiconductor wafers, which Japan wanted to exclude. Finally, a definition still had to be devised for software so that it would be adequately covered under the agreement while assuaging Europeans’ concern over their ability to nurture and maintain their own content industry. Any definition acceptable to the EU had to cover products involved in automatic data processing but not extend to music or video products.

Fibre optic cables, capacitors and photocopiers were the three key categories over which the US and EU remained at odds right up to the Singapore Ministerial. The US-EU compromise achieved in Singapore incorporated at least a portion of the controversial products into the ITA: capacitors, digital photocopying machines (but not chemical-based ones), fibre optic cables (but not raw optic fibres) were added, whereas the EU gave in on monitors with a certain screen resolution (which excluded television sets), cable boxes and digital still image video cameras. Both sides also came to an understanding on software, in which the EU prevailed in keeping entertainment software carrying sound and/or visual recordings off the table.

Although a number of non-Quad countries attempted to further modify the product list following the WTO Ministerial, the US and EU refused to go along. They had concluded “their” deal and were no longer interested in reopening the issue of coverage. This caused some frustration among trading partners although all of the above countries, and others, became founding members of the ITA.

Disappointment over the exclusion of the consumer segment of IT products may have been tempered somewhat by the ITA’s built-in mechanism for follow-up work. Countries are to meet periodically under the auspices of the WTO’s Council on Trade in Goods to, *inter alia*, review product coverage of the agreement. They will be able to further pursue the inclusion of products, including those new products which future technological breakthroughs have yet to bring to the market.

### **B. IT “Tariffs Only”**

An assessment of the significance of the ITA as a market-opening tool must take place in a broader context where - as the IT industry groups and their respective governments are fully aware - market access for IT products is obstructed not only by

import duties but also by a wide range of “behind-the-border” impediments. The relative importance of non-tariff barriers is not easily established because their effect is difficult to discern and quantify. However, judging from earlier comments, made during the Uruguay Round, by the US President’s industry advisory group for electronics, “tariffs on electronics products are not a significant determinant for sales and real access”. Restrictive government procurement and arbitrary rules of origin were among the practices the group regarded as most important.<sup>54</sup>

The ITA does not reduce non-tariff barriers affecting trade in IT products. This can be regretted or, alternatively, regarded as a virtue. Regretted because one cannot fail to note the connection between the perceived presence of non-tariff barriers in foreign markets and industry demands voiced in the US and other industrial countries for product exclusions. A virtue because, judging from past multilateral negotiations, a negotiation covering many more trade issues and involving the removal of regulatory impediments to trade, would surely have taken considerably longer to conclude given their greater inherent complexity.

In the US, both the fibre optics and capacitor industries have cited the alleged presence of non-tariff barriers in the markets of their principal competitors as one of the reasons for their opposition to the ITA. As a spokesman for Corning Inc. stressed, tariffs were not the only barriers affecting trade in telecommunications equipment (fibre optic cables) because there was a lot of “government intervention” in decisions on equipment procurement in many of the emerging markets of Asia and Latin America.<sup>55</sup> The view was thus expressed that tariff negotiations would not solve these problems and would even deprive the US of much needed coinage for future negotiations. Similarly, European producers of IT products have long complained about structural market access problems in some countries, such as a captive distribution system, especially in Japan and other Asian countries, where import penetration for many IT products is lower than in the EU or US.

Still, influential business groups such as the Information Technology Industry Council (ITI) and the European-American Chamber of Commerce were not keen to see the ITA focus on non-tariff issues. In fact, some business groups strongly argued against considering non-tariff measures in the context of the ITA because they feared that broader negotiations would risk delaying the launching of the negotiations and conclusion of an accord.<sup>56</sup> Also, the negotiating authority available to the President did not extend to non-tariff issues, and prospects for Congress to quickly come forward with a broader mandate

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<sup>54</sup> *The Uruguay Round of Multilateral Trade Negotiations*, Report of the Industry Sector and Functional Advisory Committees, Washington, January 1994, p. ISAC-05/18.

<sup>55</sup> “For US, EU is holding up progress on info-tech pact”, *The Wall Street Journal*, November 27, 1996.

<sup>56</sup> For this position, see for example *Policy Statement of the European-American Chamber of Commerce on an Information Technology Agreement*, Washington, March 20, 1996p. 1.

were not good. As a result, the view that the ITA was a “tariffs-only” exercise enjoyed practically unanimous support from US business groups and the government throughout the negotiation.

The only trading partner interested in having the agenda broadened to deal with non-tariff issues was the EU. Among the issues which Brussels thought should be addressed as an integral part of a more comprehensive ITA were product standards, intellectual property rights and government procurement.<sup>57</sup> This reflected the concern among Commission officials that non-tariff measures might continue to keep markets closed even after tariffs had been eliminated.<sup>58</sup> It was also part of a broad-based EU strategy to try to redress the perceived imbalance of having to give up higher tariffs on IT products than the US or Japan.

There was never an agreement even among Quad members to have the ITA deal directly with these issues. Japan in particular was on the defensive, whereas the US could live with some future-oriented reference to such issues in the ITA as long as it did not commit countries to engaging in negotiations. In an apparent effort to accommodate the EU, the Quad countries finally agreed in late 1996 to formulate language for inclusion in the ITA which makes reference to non-tariff barriers. As part of their periodic meetings to review the functioning of the Agreement, participants will, *inter alia*, “consult on non-tariff barriers to trade in information technology products”. The potential of non-tariff barriers undermining the market access impact of the ITA is more specifically addressed in a provision confirming that dispute settlement procedures under Article XXIII of the General Agreement would apply to any nullification or impairment of benefits which countries derive from implementation of the ITA as a result of “the application by another participant of any measures, whether or not that measure conflicts with the provision of the General Agreement”. Countries are expected to give “sympathetic consideration” to requests for consultation under the above provisions.<sup>59</sup>

The reluctance of the business community to endorse a comprehensive ITA negotiating agenda does not mean that these groups have remained inactive on non-tariff matters. Parallel to the tariff talks, the removal of non-border obstacles to market access in the sector has been pursued in a variety of other fora, including the TABD and within the WTO. Moreover, given the positive momentum imparted by the ITA, the leading

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<sup>57</sup> For example, the EU at one point proposed an annex to the ITA on non-discrimination and transparency in telecommunications procurement. It appears however that negotiators did not get to the point of discussing how incorporation of non-tariff issues could be approached conceptually and procedurally because other Quad countries kept talks limited to tariffs only.

<sup>58</sup> See “Brittan presses APEC members to join information technology deal”, *Inside US Trade*, Nov. 22, 1996, p. 15.

<sup>59</sup> *Ministerial Declaration on Trade in Information Technology Products*, op. cit., p. 4.



industrial countries, including the US, have started to pay more attention to non-tariff issues. When Quad partners met in Toronto in May 1997, they spent considerable time discussing the *future ITA agenda* (the “so-called” ITA II) and confirmed that they wish to have non-tariff barriers included in the ITA review taking place in the fall of 1997.<sup>60</sup>

### C. *Participation Requirements*

Problems in establishing co-operation in the ITA negotiation arose not only from the need to define product coverage and the complexity of classification issues involved. They also arose from the need to ensure that all important players in this sector participated in the ITA.

The ITA was conceived from the beginning as a tariff-elimination exercise whose success would be conditional upon the participation of all countries with considerable markets or industries. Although the removal of obstacles to trade in IT products was among the high-priority items which the private sector identified in late 1995 in the context of the Transatlantic Business Dialogue, it was never suggested that the EU and the US, or the Quad countries, conclude a deal only among themselves.

The perception that broad participation had to be assured was reinforced by the acknowledged requirement for any resulting agreement to be consistent with WTO rules, including the principle of making the benefits of zero tariffs available to all WTO member countries on an MFN basis. The US and other major IT producers had every interest in keeping free-riding among WTO members as limited as possible, especially on the part of emerging competitors in the developing world. The resulting push for broad participation found expression in the term *critical mass*. As [then] Acting USTR Charlene Barshefsky made clear only a few days prior to Singapore Ministerial, the US would not cut tariffs unilaterally. “There is no basis on which we will touch our tariffs in these sectors in the absence of a critical mass of countries -- which includes Asia and Europe”, she said.<sup>61</sup>

The strategy of building a global ITA was to use consensus among the most powerful IT-producing countries - the Quad group, which accounts for more than 50% of

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<sup>60</sup> A statement issued by the Chairman of the Toronto session notes that the Quad countries will “jointly pursue...expansion of product coverage and review of non-tariff measures in the context of this fall’s review of the agreement (“ITA II”), as well as problems of forced technology transfer that impede trade in technology-intensive products.” (“30th Quadrilateral Trade Ministers’ Meeting Toronto, April 30-May 2, 1997: Statement by Minister Eggleton”, reprinted in *Inside US Trade*, May 2, 1997.) The US is reported to be a particular strong opponent of forced technology transfer, which requires local production processes in order to sell in the market and appear to be widely used especially by countries in Asia.

<sup>61</sup> “Not all countries ready to support Information Technology Pact”, USIA, WTO Ministerial in Singapore - December 1996, p. 4.

world trade in the sector, as a basis from which to progressively expand the negotiating process to include other important IT players. APEC was regarded as a particularly useful stepping stone in this process because it allowed a country like the US to exercise political power vis-à-vis key developing countries of the Asian-Pacific region. Participation of Hong Kong, India, Indonesia, Korea, Malaysia, the Philippines, Singapore, Taiwan, Thailand and possibly also China, was regarded as critical to the success of the initiative. These countries are not only rapidly growing markets for IT industries in the US and other industrial countries, but have become successful exporters of a growing range of IT products, a trend that is widely expected to continue well into the next century.<sup>62</sup> Participation of Latin American countries like Argentina, Brazil, Chile and Mexico, where governments have been pursuing ambitious plans for developing high-tech industries, was also seen as desirable. But this was of secondary importance because, with the exception of Mexico, none of that region's countries is an important player in the global market (see **Table 2**).

Although many Asian countries have a stake in an open global IT market as exporters of at least some product categories, many also felt that they needed more time to nurture their domestic (infant) industries before opening the sector to full competition. Despite warnings by US and EU officials in late 1996 that the ITA was not viable without participation from a "great majority" of the APEC countries,<sup>63</sup> the support forthcoming at the Singapore Ministerial was disappointingly narrow. Korea, Singapore, Hong Kong and Indonesia signed the ITA Declaration, but other important players like Malaysia, Thailand and India remained on the sidelines, as did virtually all Latin American countries. A successful formula for winning the co-operation of more developing countries had to take into account at least some of their specific concerns.

The Ministerial Declaration issued in Singapore recognised the need for special arrangements in terms of product coverage and/or tariff phase-outs, yet the insistence on the exclusion of consumer electronics products and the lack of consensus among Quad countries on broadening the pact to include other non-IT products of potential export interest to developing countries kept the bargaining space very limited. In return for their accession to the ITA, industrial countries were willing to strike deals with individual developing countries regarding the speed of implementation of their commitments. Special arrangements on the timing of tariff cuts for many developing-country participants ultimately helped secure the level of world trade coverage - *the critical mass* - needed for the

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<sup>62</sup> Some developing countries have been successful as hardware producers (PCs, peripherals, even semiconductors). Some of these countries, among which India, Korea, and Singapore, have also adopted explicit policies aimed at nurturing a national software industry, although the software sector is still very much dominated by producers of the industrial countries and the developing countries' share in world software production and trade has so far remained extremely low. (See Carlos M. Correa, *The TRIPs Agreement and Information Technologies: Implications for developing countries*, *Information & Communications Technology Law*, Vol. 5, No. 2., 1996, p. 141-142. )

<sup>63</sup> "Brittan presses APEC members to join information technology deal", *Inside US Trade*, November 22, 1996, p.15.

accord to go into effect.

The almost complete absence of Latin American countries from the list of signatories (particularly when contrasted with the region's avid participation in the WTO's April 1997 accord on basic telecommunications services) is striking. Despite its membership of both the OECD and NAFTA, not even Mexico let itself be nudged by its powerful Northern neighbours into joining the ITA. Some officials from the region complained during the negotiation that the product coverage did not sufficiently take into account the export interests of developing countries. However, it is also true that the IT and other high-technology industries in many of these countries have long been protected by extremely high tariffs and a host of non-tariff measures. Liberalisation, particularly over such a short time span, is seen as likely to induce significant adjustment pressures for mostly uncompetitive domestic producers, a prospect many governments in the region, for all their professed conversion to liberalisation "theology", probably found unpalatable in political terms. The desire of Brazil to concentrate liberalisation efforts on Mercosur in the hope that sales to this enlarged (regional) market and associated advantages of economies-of-scale production would boost its national high-tech industries, effectively prevented Argentina and other Mercosur members, bound by the customs union's common external tariff policy, from joining the ITA. Mexico again was unwilling to open its market to its South American partners without receiving concessions in return. By the summer of 1997, only Costa Rica, which represents the largest IT market in Central America, already has relatively low import tariffs and succeeded in attracting significant foreign direct investment in this sector, had signed on.<sup>64</sup>

Suffering from a growing trade deficit with China in (so far mainly consumer) electronics, both the US and EU consider that country as representing a much more serious free-rider problem than say Brazil or Argentina. China, which is not a member of the WTO, attended some of the negotiating sessions but expressed little interest in signing the ITA at the time. The leading industrial countries did not insist, in part because the ongoing negotiations over China's accession to the WTO provide a forum for pressing Beijing on this matter. The Chinese authorities have since signalled an interest in signing on to the ITA, without however giving a specific timeframe for doing so.

#### ***D. Timetable of Implementation and Staging***

The time frame for the tariff phase-outs became the subject of intensive debate only towards the end of the negotiation. The Quad countries had agreed early on that the ITA would be implemented as soon as possible. Meeting business demands for duty-free trade

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<sup>64</sup> See "CyberCentral (America)", *Latin Trade*, November 1997, p. 68-69.

in the sector by the year 2000, seemed a reasonable enough target. In terms of specifics, as many as four steps of tariff reductions were discussed informally by the leading industrial countries in 1996. Some industry groups argued against more than 2 stages on the grounds that the administrative cost of handling each step would exceed the benefits from reducing tariffs that were often 2-3% or lower.

In the course of the negotiations, difficulties with this timetable of implementation emerged on two fronts. Dispute between the EU and the US over semiconductors and customs classification (discussed in detail in the following two sections) prompted negotiators to explore the possibility of accelerated tariff cuts for certain IT products. The other, more fundamental, difficulty was that many developing countries favoured phase-in periods that extended well beyond 2000.

The Declaration issued in Singapore stipulated that as a general rule tariff cuts would start on July 1, 1997 and take place in 4 stages up to January 1, 2000. At the same time, it explicitly provided that the staging of the tariff reductions could be extended “in limited circumstances”.<sup>65</sup> This provision opened the door for striking satisfactory bargains with several yet uncommitted countries. Although Singapore and Hong Kong heeded the call from the US and the EU for the more advanced competitors in this sector to eliminate all duties by 2000 on an equal footing with the Quad countries, other countries with important industries and markets dragged their feet until the last minute. This was especially true for certain ASEAN countries and India. In order for the ITA to reach the target of 90% of world trade, the participation of a country like Malaysia, the world’s sixth largest exporter and 5th largest importer of IT products in 1995, was absolutely essential. However, Malaysia, as well as Thailand and India, insisted on being allowed to retain tariffs on many products well beyond the year 2005.<sup>66</sup> Although none of the major industrial countries were happy with their offers, the US in particular rejected the schedules put forward as excessively long and haggled for a tightening.

The final arrangement on implementation extends the staging process up to 2005 for the majority of participating developing countries (including Costa Rica, India, Indonesia, Malaysia, Thailand, Romania, Estonia, Philippines) and even Korea and Taiwan.<sup>67</sup> All

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<sup>65</sup> *Ministerial Declaration on Trade in Information Technology Products, op. cit.*

<sup>66</sup> Malaysia offered to phase out tariffs by 2008 for fibre optic cables and 2005 for certain other products. Thailand and India each wanted some products not to be subject to ITA obligations until 2007.

<sup>67</sup> In addition to extended staging, a number of countries (Malaysia, Thailand, Poland, Romania, Czech Republic, Slovak Republic, Switzerland) have to meet domestic procedural requirements so that their first instalment of tariff reductions will take place only on 31 December 1997 or 1 January 1998 (see WTO, Committee of Participants on the Expansion of Trade in Information Technology Products, *Status of Implementation (Note by the Secretariat)*, G/IT/1/Rev.1, October 28, 1997). Details on the special phase-out arrangements were not made public by the participants when the negotiation ended. They are contained in the tariff schedules which countries submit to the WTO. As all schedules had not yet been published by the WTO,

other signatories will remove their tariffs in four equal stages beginning on 1 July 1997, with the final reduction scheduled for 1 January 2000.

### *E. Reciprocity, Compensation and the Free-Rider Question*

The winning formula of any trade negotiation is to ensure benefits to all participants. *Reciprocity* and overall *balance of concessions or benefits* are key criteria which governments use in assessing prospective negotiating results. Reciprocity in the sense that major participants would lower tariffs by a comparable overall degree or percentage had been the dominant bargaining concept for GATT negotiations. This concept was already modified during the Uruguay Round, where a competing concept envisioning a common end result in terms of zero import duties, was pursued for a number of selected sectors.<sup>68</sup>

Negotiating the elimination of import duties within one single sector, as happened with the ITA, was different still from the Uruguay Round tariff negotiations, where the zero-for-zero approach had been tried for several sectors in parallel, and where cross-sectoral demands and linkages had developed towards a balanced overall package. In a negotiation confined to a single sector, how could balance be achieved within the sector itself when tariff rates differed so significantly between the EU and many developing countries, on the one hand, and Japan and other Quad countries, on the other? It was difficult to see how this negotiation could succeed, unless countries abandoned an overtly mercantilistic bargaining approach and simply concluded that cutting tariffs was in their own economic interest.

It was the EU which early on during the negotiations took the position that, because the results of an ITA would not benefit all participating countries evenly, “balancing measures” in the form of additional tariff cuts would be needed *outside the IT sector*. This position reflected the particular situation of the EU. Given its relatively higher tariffs on semiconductors and many other IT products, it would have to give up more in terms of protection for the domestic industry than the US and Japan, its major competitors. Since, additionally, it would not be easy for the Commission to sell to the member states an accord that would open the EU’s market when the value of its IT imports was twice that of its exports, EU officials felt that they needed additional compensation from the Union’s major trading partners.

A related issue of reciprocity is the *free rider issue*. In earlier multilateral

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it is impossible to provide a complete listing of countries that were granted flexibility in cutting their tariffs, or further specifics concerning arrangements in individual cases. Reportedly, Korea was given a grace period of 4 years after 2000 for 13 items, and the Philippines a grace period of 5 years after 2000 for 20 items.

<sup>68</sup> See Preeg (1995), *op. cit.*, pp. 187-88.

negotiations, developing countries in particular offered more modest or even insignificant reductions in trade barriers on the grounds that full reciprocity was not supportive of their development goals. This syndrome weakened considerably in the Uruguay Round, in part because the strong export competitiveness of the East Asian and other newly industrialised economies made it difficult for these countries to justify the need for continued “special and differential treatment”.<sup>69</sup> In the ITA negotiation, one of the goals of the industrial countries was to ensure that all (generally high-tariff) developing countries with important IT industries or markets would participate in the market-opening exercise so as to prevent them from free-riding on results which would become available to all WTO members on an MFN basis. Paradoxically, the structure of existing tariff rates made countries that already had very low tariff protection in this sector vulnerable to criticism of enjoying a “free ride” in any ITA deal because they would not have to give anything up. For example, the EU sought to deny a free ride to Japan by requesting that it make additional tariff concessions in non-IT sectors that were of interest to EU businesses.<sup>70</sup> Tokyo however did not feel obliged to accommodate such a request, especially since the US did not team up with the EU on this issue.

Resisting a similar EU request for tariff cuts in non-IT sectors to compensate for the elimination of higher EU tariffs on IT products, US officials argued that all countries should see the ITA as being “good for its own sake”. After all, the ITA would lower the cost of many products that were inputs into other products made in Europe and elsewhere.<sup>71</sup> Most IT industries of the leading industrial countries tended to share this view. So did several EU member states, including the United Kingdom, Germany, the Netherlands, Sweden and Finland. However, other EU member states, and European semiconductor producers, felt that balancing measures not related to tariffs on IT products were important.

Only when pressure started to mount in the summer of 1996 for negotiators to make enough progress as to “deliver” an ITA in time for the WTO Ministerial meeting in Singapore at the end of the year, did the Clinton administration show a willingness to entertain requests in other sectors, subject to its residual negotiating authority. Other countries, notably Canada and some of the emerging Asian economies, also expressed interest in tariff cuts on non-IT products.

At their meeting in Seattle in September 1996, Quad trade ministers exchanged lists of sectors where they would like to expand the IT package of zero-for-zero commitments.

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<sup>69</sup> See Preeg (1995), *op. cit.*, p. 188. Preeg further calls NAFTA the crowning blow against the free-rider rationale because Mexico agreed to comprehensive free trade with the US on an almost totally reciprocal basis even though it started with a much higher level of protection.

<sup>70</sup> “EU seeks concessions for technology pact”, *Journal of Commerce*, July 25, 1996, p. 5A.

<sup>71</sup> “US will resist attempts by EU to obtain compensation in info- technology pact, aide says”, *International Trade Reporter*, August 21, 1996, p. 1326.

The products mentioned included pharmaceuticals, paper and wood products, chemicals, non-ferrous metals, distilled spirits and oilseeds.<sup>72</sup> Textiles and clothing was another sector where Hong Kong and certain other Asian countries supported zero-for-zero tariff commitments as part of a final package, presumably to compensate certain countries, such as Malaysia, Indonesia or China, that did not produce as broad a range or as much volume of covered IT products as for instance Korea or Taiwan and therefore complained about receiving fewer benefits under the proposed ITA. Some smaller Southern EU member states without a well-developed IT production capacity of their own, also felt they should be compensated through a reduction in US tariffs on textiles and clothing and footwear.

At the end of September 1996, the various bids aimed at broadening the package of trade commitments prompted one EU official to quip that the ITA might now be seen as standing for “Information, Textiles and Alcohol agreement”.<sup>73</sup> However, neither the US nor the majority of EU member states were really keen on touching a sensitive issue like textiles, the distilled spirits industry was facing an uphill battle in Japan, and Brussels itself was coming under criticism from impatient European electronics companies for showing too little negotiating flexibility notably with respect to its compensation demand and refusal to agree to phase out its microchip tariffs prior to joining the US-Japan semiconductor accord.<sup>74</sup> To sum up, countries differed significantly in their sectoral preferences. Any sustained effort to reach a consensus on non-IT products would have distracted negotiators from trying to work out a deal on IT products and diminished chances for an accord to be ready in time for the Singapore ministerial.

With the exception of a last-minute (side) deal between the US and EU concerning distilled spirits, the ITA was finalised without trade-offs involving tariff concessions on non-IT products. Japan left the negotiating table without making offsetting tariff reductions elsewhere. Reportedly to placate last-minute French reservations about the ITA, the US agreed in Singapore to co-operate with the EU in removing import tariffs on brown distilled spirits such as cognac and whisky by the year 2000 (thus accelerating cuts agreed earlier during the Uruguay Round) and tariffs on white spirits such as gin and vodka, as well as liqueurs, over 5 years beginning in 1997. France’s hesitation was clearly linked to the price of cognac in some countries.<sup>75</sup> A Commission spokesman tried to explain the connection between the ITA and the liquor deal in the following manner:

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<sup>72</sup> At the Singapore Ministerial, the Quad countries also announced an agreement to cut tariffs on a wide range of pharmaceutical products. However, this appears to have been a completely separate accord, not linked in any way to the process of negotiating the ITA.

<sup>73</sup> Quoted in “US, EU settle fight over ITA; negotiations to resume this week”, *Inside US Trade*, Special Report, October 1, 1996, p. 4.

<sup>74</sup> In the Uruguay Round, the major industrial countries had agreed to end tariffs for whiskey and brandy over 10 years. The industry subsequently made an expansion of those commitments to other distilled spirits a priority.

<sup>75</sup> “Zero tariffs agreed on information technology products”, *Brussels Focus*, 1997, Issue 1, p. 3.

“We are not trying to pretend that whisky and cognac are IT products. We’re saying, merely, the more the merrier. We are opening our market in a serious way in semiconductors and we think it is more balanced and more ambitious if we can broaden coverage not only in IT products, which we have now successfully done, but also in some non-IT products”.<sup>76</sup>

The liquor deal formed an integral part of the broader US-EU compromise reached at the Singapore meeting. Its economic significance can of course be questioned because neither Japan nor any other ITA signatory has joined this undertaking. Moreover, what the EU considered a balanced deal soon came under attack from third parties. In the spring of 1997, Caribbean rum producers protested the inclusion of rum in the US-EU side agreement on liquor. The US and EU subsequently modified their understanding on white spirits by extending the phasing of tariff reductions for high-quality rum to 2003, so as to minimise adverse effects on Caribbean rum producers.

#### ***F. Linkage to the 1996 US-Japan Semiconductor Agreement***

Perhaps the most important roadblock to quick progress on the ITA constituted a particularly long and acrimonious US-EU confrontation over a new semiconductor accord which the US and Japan negotiated during the summer of 1996. This demonstrates how progress in the negotiation became politically (and procedurally) linked to developments in other arenas of trade policy that influence competitive conditions in the global market for IT products. This linkage was firmly established when the EU withdrew from the ITA discussions during the summer of 1996 in an effort to compel the US to agree to its inclusion into the hitherto bilateral semiconductor arrangement.

US-EU trade frictions over semiconductors date back to 1986 when, as part of a broad drive to promote increased access to Japan’s domestic market and seek redress for alleged Japanese dumping, the US concluded a bilateral Semiconductor Arrangement with the Japanese government. The secret bilateral negotiation of a framework intended to affect international market conditions for a vital industrial input industry like semiconductors without consultation with the EU, and the perceived economic damage to EU industry resulting from the accord -- reinforced European beliefs that the accord conferred preferential access for US firms to the Japanese semiconductor market. This suspicion was reinforced by the subsequent rise in the US’s share of the Japanese market while the EU’s share remained at around 2%.<sup>77</sup> The above developments, not surprisingly, led to a rising

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<sup>76</sup> For quote see Trading in A Free World, *Information Strategy*, February 1997, p. 22.

<sup>77</sup> See the more detailed account of this background by Kenneth Flamm, “Semiconductors”, in Gary Clyde Hufbauer (ed.), *Europe 1992: An American Perspective*, The Brookings Institution, Washington, 1990, pp.



chorus of European protests over the US-Japan accord.

Europe's experience since the arrangement was signed had left its marks. The accord had already been renewed once and was set to expire on July 31, 1996. When the US began to press Japan into negotiating a successor arrangement, the EU insisted on being included and used the ITA as a lever to achieve this goal. From the point of view of European semiconductor makers, the key issue at stake was to make sure that they obtained equal access as their US competitors to Japan's \$34 billion semiconductor market. The ITA's tariff elimination exercise would do nothing in this regard because Japanese import duties for semiconductors were already zero. To the contrary, the ITA would favour the Japanese, who would obtain easier access to the European market as a result of the proposed removal of the EU's high semiconductor tariffs under the pact. Gaining improved access to the Japanese market was thus a very high priority for European semiconductor makers. Without being included in whatever arrangement the US and Japan were working out, the European industry might have blocked the inclusion of semiconductors into the ITA.

In a July 30, 1996, letter to Acting US Trade Representative Barshefsky, EU External Affairs Commissioner Brittan warned the US and Japan that the EU would permanently quit the ITA initiative if it was not made part of a deal on semiconductors. Brittan also explicitly rejected calls by the US industry that the EU first drop its tariffs on semiconductors before joining the new chips accord.<sup>78</sup> The EU informally raised the prospect that the three sides strike a deal that specified the elimination of semiconductor tariffs by a certain date. When the US and Japan continued their bilateral talks and struck a new pact in early August 1996, the EU followed up on its threat and withdrew from the technical work that was going on the ITA's product coverage. As any ITA would not achieve its "critical mass" of product coverage without the EU's participation, the ITA talks effectively ran into the ground.

As the weeks passed, EU officials would note bleakly that the US-Japan semiconductor arrangement was the main obstacle to reaching an ITA. As Sir Leon Brittan put it at the Quad meeting in Seattle in September 1996, "we are not prepared to see the US-Japan discriminating [semiconductor] agreement go ahead unconditionally... We are quite happy to negotiate to drop tariffs, but there has to be other things in the agreement as well."<sup>79</sup>

The crux of the dispute was that, in order to create a level playing field for all

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<sup>78</sup> "Brittan letter on semiconductors", reprinted in *Inside US Trade*, August 2, 1996, p. 26-7.

<sup>79</sup> Quoted from "US, EU seek to resolve split on technology pact", *Reuters* (wirenews), September 26, 1996.

participants, the semiconductor accord stipulates that only companies from countries that had eliminated or had committed to eliminating their semiconductor tariffs, could take part in the co-operative private sector activities that were at the core of the accord.<sup>80</sup> Although it was possible to delay the private-sector meetings under the accord somewhat, as a *quid pro quo*, the EU would concede only to reduce import duties gradually, in accordance with the timetable of the yet to be concluded ITA. Unwilling to grant their European competitors a free ride in the Japanese market, US semiconductor makers rejected this as not being quick enough.

Discussions were held in the fall of 1996 to figure out how European companies could join the semiconductor agreement while the EU would make concessions on the tariff issue that would satisfy the US industry.<sup>81</sup> In September, the dispute was settled by a compromise between the US, Japan and the EU. The US and Japan agreed to postpone from January until at least March 1997 the first meetings under the new US-Japan semiconductor accord, which would give countries time to conclude an ITA that would include a commitment to the “expeditious” elimination of tariffs on semiconductors and other IT products.<sup>82</sup> The truce was short-lived. Although the ITA discussions resumed, statements in both Washington and Brussels showed that the deal reached on semiconductors was not as solid as had been hoped. Because the European Commission and the US semiconductor industry chose to interpret the term “expeditiously” very differently, disagreements over the speed of eliminating EU semiconductor persisted.<sup>83</sup> As noted earlier, this issue remained outstanding even by the time of the Singapore Ministerial.

### ***G. Blurring IT Boundaries: The US-EU Tariff Classification Quagmire***

Another lingering dispute which became closely tied to the ITA negotiation had to do with the classification of IT products. The dispute arose when the EU in an effort to harmonise member states’ tariff classification practices for high-tech goods issued clarifications in 1994 and 1995 that resulted in several EU member states re-categorising certain electronics products traditionally viewed as computer devices into the higher-tariff categories of telecommunications and consumer electronics for customs purposes. The products affected were initially only certain local area networking (LAN) equipment, such

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<sup>80</sup> USTR, *US and Japan Reach Semiconductor Accord*, Press Release, August 2, 1996.

<sup>81</sup> The new semiconductor agreement provided for the creation of a Semiconductor Council, where industry officials can discuss issues of mutual concern, including market access. By that time, the US and Japan industry associations were already beginning to set up the structures for industrial co-operation called for under the semiconductor agreement, and Brussels wanted European chip producers to be immediately admitted to this undertaking.

<sup>82</sup> See “Understanding on Semiconductors and ITA Between the European Commission, Japan and the United States”, reprinted in *Inside US Trade*, Special Report, October 1, 1996, p. 5.

<sup>83</sup> The European Commission only committed to eliminating tariffs by the year 2000, the envisioned date for phasing out tariffs on IT products under the ITA. This was not “expeditious” from the viewpoint of the US industry, which at the time of the Singapore Ministerial was still insisting that the EU eliminate its semiconductor tariffs by the end of 1997.

as adapter cards, routers and switches.<sup>84</sup> However, in the course of 1996 the list was expanded to include CD-ROM drives and certain personal computers with multimedia capabilities.

These reclassifications would probably not have given rise to political frictions with the EU and “spilled over” into the ITA negotiation, had the reclassified goods not been subject to (at times significantly) *higher* EU import duties. Furthermore, in the context of the ITA negotiations, countries could feel tempted to use reclassification as a protectionist tool to slow down the liberalisation process for sensitive products or even keep products entirely off the ITA coverage list. At one point, the EU took multimedia PCs, which are covered by the ITA, out of the computer category in the Quad group’s working list of the ITA and reclassified them as televisions (i.e., a consumer electronics product) that carried a 14% tariff and were not included in the list.

In early 1996, the US began to warn Brussels that “unless the Commission puts a stop to these practices immediately, we will have no choice but to pursue our options, including dispute settlement in the WTO”.<sup>85</sup> Although US exporters were not the only ones affected by these EU decisions (the Japanese also complained, and in early 1996 the EU diffused a bilateral dispute with Tokyo by dropping plans to define CD-ROM drives as consumer electronics goods rather than as computer peripherals<sup>86</sup>), it was US industry and government officials who felt particularly strongly that the EU policy represented an unjustified increase in taxes on sales into the European market and imposed an unfair burden on US exporters as well as their European customers (including European-based affiliates of US firms).<sup>87</sup>

Both EU and US officials at that time expressed the hope that the row could be settled soon, either within the framework of the World Customs Organisation, which decides on customs classifications, or in talks which were then under way between the

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<sup>84</sup> The dispute began when the European Commission in June 1995 determined that adapter cards would be moved from category 8471 (computer and computer parts, subject to a 3.5 per cent import duty) into category 8517 (telecommunications equipment, subject to a 7.5 per cent duty) of the customs classification schedule.

<sup>85</sup> This warning was conveyed by USTR Mickey Kantor to EU Commissioner Brittan in a letter addressing this issue in March 1996 (“Europe’s computer-network tariffs may spark US complaint to WTO”, *Wall Street Journal*, May 5, 1996).

<sup>86</sup> “Washington attacks EU over computer tariffs”, *Financial Times*, May 23, 1996.

<sup>87</sup> In 1996, the reclassification policy was for the first time mentioned in the section on objectionable EU trade and investment practices of the annually published National Trade Estimate Report on Foreign Trade Barriers. US IT producers also went out of their way to emphasise the cost effects of the reclassification. One of the leading US computer networking manufacturers, Cisco Systems Inc., claimed that the reclassification of computer-networking equipment from a 3.5 per cent to a 7.5 per cent tariff product had meant an additional \$275 million in import duties to be paid on US networking equipment in 1995 and could reach an additional \$443 billion in 1999 (“Europe’s computer-network tariffs may spark US complaint to WTO”, *Wall Street Journal*, May 5, 1996).

Quad countries on an ITA.<sup>88</sup> If tariffs were eliminated on all IT products, countries would no longer be able to raise tariffs by reclassifying products. Moreover, the faster these duties were abolished, the more temporary and less severe would be the economic consequences of the EU classification decisions for foreign suppliers as well as domestic buyers.

In Washington it was hoped that, as part of the broader ITA talks, Brussels would agree to immediately reverse the classification actions already taken. But all attempts to obtain a reversal of EU decisions failed. The EU agreed to bring reclassified goods (LAN and multimedia computers) under ITA coverage but insisted that the reclassified products remain in the new categories with higher tariffs and not benefit from any accelerated duty reductions.

As Brussels was not forthcoming on this matter, the Clinton administration finally acted upon a request of the American Electronics Association and initiated a WTO case in October 1996. Although this occurred only shortly after there had been a breakthrough on another US-EU dispute - that involving semiconductor issues - and despite the fact that ITA negotiations were just regaining momentum, the US industry felt it was time for the Clinton administration to act because it was convinced that only the threat of a WTO-authorized penalty would force the EU to eliminate duties on these products.<sup>89</sup>

US officials continued to express their preference for resolving this issue in the context of a speedily concluded ITA. However, as noted earlier, the Agreement was eventually finalised without settling this specific bilateral dispute. In fact, when the US signed the final accord, it expressed reservations about the tariff classification of certain computer products in the schedule of the European Union. Voicing “deep concern that the European Union had been unwilling to address its recent tariff increases on certain computers and LAN equipment in violation of its Uruguay Round commitments”, USTR Barshefsky put the EU on notice that the US would continue its WTO case and “consider what other actions might be appropriate to ensure that the EU meets its obligations”.<sup>90</sup>

To settle the bilateral dispute with the EU, which concerned very specific products, was not the only goal US negotiators pursued at the bargaining table. The US also wanted the ITA to contain general rules which would make it impossible for participants to

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<sup>88</sup> “Washington attacks EU over computer tariffs”, *Financial Times*, May 23, 1996.

<sup>89</sup> See “AEA urges to take action against EU for raising tariffs on computer equipment”. *International Trade Reporter*, October 16, 1996, p. 1602, and “US expects to resolve dispute with EU over LAN tariffs with global info-tech pact”, *International Trade Reporter*, December 4, 1996, p. 1878.

<sup>90</sup> Quoted in “ITA finalised as US-EU reclassification spat continues”, *Abstracts: Weekly News from the European-American Chamber of Commerce*, Washington, Vol. 8, No. 13, March 28, 1997, p. 2.

reclassify products for which the ITA eliminated tariffs into categories with import duties (e.g., consumer products or new categories resulting from technological changes). Because technology changes so rapidly in this sector and new products continuously come onto the market, IT producers have been particularly concerned that there could be plenty of opportunities for ITA participants to manipulate the existing product classification system so as to nullify the ITA's tariff concessions and trade-liberalising effects.

These concerns gave important impetus to efforts to define the ITA's existing product coverage as carefully and precisely as possible, and to incorporate modalities that would allow countries to take future technological changes into account. One of the safeguards aimed at preventing arbitrary reclassification is the additional use of generic product descriptions covering products no matter what their HS designation may be.<sup>91</sup> Additionally, participants will in future meetings (the first of which is to be held no later than September 30, 1997) examine existing cross-country differences in classifying IT products under the ITA listings with the objective of ultimately harmonising national practices of classifying products within the HS nomenclature. Towards this end, they have pledged to consider the interpretations and rulings of the World Customs Organisation and to seek to resolve differences in classification through co-operative approaches. Agreement was also reached to hold periodic meetings under the auspices of the Council on Trade in Goods "with a view to agreeing, by consensus, whether in the light of technological developments, experience in applying the tariff concessions, or changes to the HS nomenclature coverage should be modified to include additional products."<sup>92</sup> In other words, the ITA has been constructed as a dynamic, forward-looking regime explicitly designed to keep up with the rapid pace of technological change in this sector. Newly developed products account for a larger portion of sales of electronics each year and their exclusion from the ITA would diminish the trade-liberalisation effect of the Agreement.

## **V. OUTSTANDING ISSUES AND OUTLOOK**

That the ITA represents an important achievement in multilateral trade diplomacy is beyond dispute. The inherent dynamism of the sector, its large and increasing importance in world trade, and the growing consensus world-wide that a fuller harnessing of the benefits of the IT revolution holds the key to growth, development and prosperity, all contributed to the negotiation's successful outcome: one that rallied 42 nations accounting for a remarkable 92.3 percent of world trade in IT products. The trade agreement is of considerable value to all users of information technology products and the global economy

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<sup>91</sup> For example, LAN apparatus and multimedia computers are included under the heading of products to be covered "wherever they are classified in the HS".

<sup>92</sup> *Ministerial Declaration on Trade in Information Technology Products*, op. cit. To carry out these tasks, signatories to the ITA in late March 1997 set up a Committee on the Expansion of Trade in Information Technology Products.

as a whole. The direct and indirect gains accruing annually from the ITA have been estimated at some \$50 billion, a *de facto* tax break beneficiaries can now hope to direct to more productive uses.

The ITA is significant as well in its potential for signalling a shift towards greater sectoral specificity in liberalisation and rule-design efforts. Much of this purported “shift” is in fact coincidental, involving as it did stand-alone negotiations in closely related areas - the ITA on the one hand, and the “left-over” Uruguay Round negotiations on basic telecommunications on the other - to be loosely packaged as a complementary whole. No WTO member has championed the cause of sectoral specificity more forcefully than the United States.<sup>93</sup> In part, this reflects the narrow confines of the US Trade Representative’s residual negotiating authority in the absence of a renewed fast-track mandate. US calls for greater sectoral activism on the tariff-reduction front, particularly in areas where US exporters enjoy a clear competitive edge, have arguably allowed the Executive branch to make the most of an otherwise difficult situation and to maintain the long-held (though increasingly questioned) US tradition of multilateral leadership.<sup>94</sup>

There are, however, reasons to believe that the recent US attraction to sectoralism reflects more profound changes in the country’s trade policy stance. US attitudes over the last decade manifest a growing aversion in both business and government circles to long, linkage-intensive, trade-off driven, comprehensive negotiating rounds. In turn, such attitudes reflect the need for quicker economic and political returns on negotiating “investments” in the face of heightened public hostility towards market liberalisation and the difficulty of “selling” large negotiating packages to a testy Congress. In the words of Deputy USTR Jeffrey Lang: “The success of the new [single sector] approach promises to quicken the tempo of trade liberalisation. It appears we can now negotiate agreements more or less continually, as long as countries are prepared to make the necessary commitments.”<sup>95</sup>

Culminating as it did at the WTO’s first Ministerial meeting, an environment in which considerable political energy could be brought to bear on its outcome, and given the sector’s defining characteristics, the ITA was in many respects tailor-made for success, a

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<sup>93</sup> The success of the ITA and the basic telecommunications negotiations also fuelled the US belief that a similar outcome could be expected of ongoing negotiations on financial services. The currency and financial system turmoil experienced of late by South-East Asian nations may however have dented such expectations. The latter negotiations are scheduled to conclude in early December 1997. See WTO (1997), *Opening Markets in Financial Services and the Role of the GATS*, Special Studies, Geneva: World Trade Organisation.

<sup>94</sup> The ITA, the April 1997 WTO agreement on basic telecommunications services, and the recently unveiled strategy to achieve tariff-free trade over the Internet are all elements of the Clinton-Gore administration’s high-profile “Framework for Global Electronic Commerce” initiative.

<sup>95</sup> As quoted in Guy de Jonquières, “Template for trade talks”, in *Financial Times*, (18 February 1997).

“slam dunk” in basket-ball speak! Still, as the Agreement’s negotiating history suggests, the slam dunk proved more difficult to perform than expected, as it ultimately took two side agreements - one giving the EU access to the US-Japan semiconductor agreement and the other involving a low-tech accord on distilled spirits to clinch the deal! This latter feature inevitably raises the question of the extent to which future stand-alone sectoral agreements can be expected to command the visibility, economy-wide importance and converging *world-wide* interest - among producers, users and governments - that characterised the ITA negotiations.

Basking in the success of both the ITA and the WTO basic telecoms agreement, the US wasted no time in producing a long shopping list of sectors in which it hoped to secure duty-free trade, whether on a bilateral (i.e. US-EU), regional (i.e. APEC) or multilateral basis. Included in the list were chemicals, non-ferrous ores and metals, environmental technologies and services, forest products, medical equipment, fish and food products, as well as energy-related equipment and services. The assumption underlying the US proposal is that further sectoral negotiations would follow the pattern set by the ITA: (i) tariff elimination over a short time frame with [little or] no exceptions to product coverage; (ii) limited flexibility for extended staging on a product-by-product, country-by-country basis; (iii) all tariff reductions or GATS commitments to be bound in Members’ WTO schedules; (iv) a required critical mass of participating countries, accounting for a substantial share of global trade in the sector; and (v) a general commitment to examine and consult on non-tariff measures as a follow-up to initial tariff elimination. Whatever US ambitions may be, discussions held in the context of Quad and APEC have revealed great difficulties in launching new sectoral liberalisation efforts.

Returning to the ITA, a different set of issues arises with respect to its built-in agenda for further liberalisation. The ink was barely dry on the ITA that, prodded on by industry demands, countries (especially the US) called attention to the need for a so-called ITA II. These talks, which WTO Members agreed to commence in October 1997 with a view to concluding in July 1998 (and thus leading to implementation by January 1, 1999), would aim to: (i) remove non-tariff barriers to trade in IT; (ii) broaden the Agreement’s product coverage; (iii) identify products for which accelerated tariff cuts might be envisaged; and, (iv) possibly allow US calls for tariff-free trade over the Internet to be heeded in a multilateral setting.

In this context, the failure of the EU and other participants such as Australia to persuade the US to delay the ITA long enough to include a set of negotiated disciplines on IT-related non-tariff barriers (NTBs) in the accord is not insignificant. Although the ITA contains a built-in liberalisation agenda on NTBs - an approach first pioneered in key Uruguay Round Agreements such as agriculture and services, an ITA II may well prove decidedly harder to conclude in the absence of the Ministerial “glamour” of duty-free trade

provided by ITA I.

From the point of view of both maintaining broad interest world-wide (particularly outside the OECD area) in continued IT negotiations and allowing consumers to reap the full benefits of the emerging information society, an important question concerns the future treatment of the consumer electronics' market segment. That the coverage of consumer electronics products would continue to be fiercely resisted by the EU should hardly surprise, the sector offering a textbook case of protectionist capture. More paradoxical is the US attitude, whose dominance of the non-consumer electronics market segment is such as to suggest greater negotiating latitude vis-à-vis countries who may come to view the ITA as a "selfish" US-EU initiative. While the lack of interest shown to date by the US in covering consumer electronics reflects in part the transatlantic bias of the first round of ITA talks, continued "selfishness" on the consumer electronics front could slow down liberalisation momentum in the IT sector as a whole. Preliminary US industry preparations for work on an ITA II suggest a possible shift in the US position, as consumer electronic equipment and components (including CD and digital video disc players, television receivers and tuners) have been placed on the "wish list" of products for possible expansion of the ITA, along with many other inputs, parts and production equipment for items already covered by the Agreement. One would hope that, faced with the increasing blurring of the boundaries between the industrial and consumer segments, European producers might in future also adopt a more open position.

The question also arises of the extent to which tariffs, whose removal the ITA is limited to, represent the most significant market access impediment facing IT producers. While continuing feuding between the US and the EU over the reclassification of certain tariff items (a recent interim WTO ruling on EU reclassification of LAN equipment and PCTVs supported the US view only partially) suggests that border impediments can remain burdensome in some instances, and without discounting the economic significance of some of the tariff cuts achieved, it bears recalling that key players in the IT industry have expressed recurring concerns over the existence of a broad set of public and private anti-competitive practices around the world. Box 1 provides an illustrative list of non-tariff impediments to market access for IT products. These range from discriminatory government procurement practices to unduly burdensome product testing and certification procedures, or from TRIM-like forced technology transfers to industrial subsidises, discriminatory rules of origin and inadequate (or poorly enforced) intellectual property protection standards.



**BOX 1. NON-TARIFF IMPEDIMENTS TO TRADE AND INVESTMENT IN IT PRODUCTS**

**A. Technical Standards and Related Regulatory Barriers**

*Standards and national systems for testing certification, and laboratory accreditation are an important part of industrial production and global trade in IT products. A substantial portion of traded IT products is subject to specifications or testing requirements which products must comply with before being placed in the market. These mandatory requirements are most often defined at the national level and can result in additional costs or outright exclusions of foreign products unless they are reengineered or tested to local specifications. Incompatible technical standards across countries may also result in barriers to trade because they lessen competition by locking buyers into a limited number of suppliers and fragment markets. Industry representatives typically regard government regulations on how a product should meet national standards as posing some of the most serious obstacles to trade in IT products. Issues to which the IT industry would like to see governments devote priority attention include:*

- transparency of all regulations relating to national conformity assessment systems, including certification and labelling requirements;*
- streamlining of national product testing and certification requirements;*
- elimination of unnecessary duplication of inspection, testing and standards certification through, inter alia, mutual recognition by governments of test data, laboratory competence and certification requirements, based on the “once tested, accepted everywhere” principle;*

*A number of mutual recognition agreements (MRAs) have been concluded at the bilateral level. For instance, as a result of an MRA applying to public telecommunications networks and equipment subject to approval for electromagnetic emissions and interference, which the EU concluded with the US and Canada in mid-1997, consumers and user industries are expected to generate annual savings of more than \$1 billion in unnecessary costs. In addition, the approval time needed for product certification of electromagnetic compatibility for telecom equipment will be shortened significantly. The EU is conducting similar negotiations with Australia, New Zealand, Japan, and Switzerland. Certain initiatives aimed at harmonising equipment certification procedures and facilitating the mutual recognition of conformity assessments have also gotten under way among members of APEC and NAFTA.*

*The WTO Agreement on Technical Barriers to Trade (TBT) removes many existing technical barriers to trade reflected in the preparation, adoption and application of*

*national standards. It requires notification to the WTO of work on new national regulations, extends the principle of national treatment and non-discrimination to conformity assessment regimes (registration, inspection, laboratory accreditation etc.) and encourages (but does not require) signatories to move toward harmonisation of conformity assessment through mutual recognition or each others' procedures. It also encourages recourse to internationally-agreed standards.*

## **B. Government Procurement**

*The public sector is the single largest user of information and communications technologies in many countries. For example, public sector purchases of telecom equipment account for well above 50% of US companies' sales in Europe and as much as one third of US computer firm sales. In a developing economy like the Philippines, the public sector represents 40% of the total domestic IT market. While government purchases or government-financed projects offer substantial sales potential, discriminatory ("buy domestic") procurement regulations favouring local firms, lack of transparency of bidding procedures, and red tape prevent or discourage foreign suppliers from competing for public contracts. Procurement markets are also often plagued by problems of bribery and corruption involving public officials.*

*Existing international disciplines constitute an important step in the direction of opening up public purchases to global competition. The plurilateral Agreement on Government Procurement (GPA) provides for non-discriminatory treatment among domestic and foreign suppliers of goods and services by listed government entities and public enterprises, transparent procedures, and the use of non-discriminatory specifications based on performance rather than design or descriptive characteristics and, where they exist, on international standards. In approaching the issue of access to public procurement markets by foreign-owned or foreign-origin IT, the following considerations need to be borne in mind:*

- the GPA's disciplines do not extend to the purchases by such big IT user constituencies as telecommunications administrations, which purchase large amounts of telecom equipment and related goods, and have been expanding their IT budgets in many countries. As a result, "buy domestic" and other national requirements either formally or informally direct these entities in many countries to purchase IT products on preferential terms favouring domestic suppliers.*
- only about 20 (mainly industrial) countries, not all of which are current ITA signatories, are signatories to the GPA. This means that the procurement practices of the vast majority of WTO members, which means that not all ITA participants are members. This means that many countries' procurement practices are not governed by any rules whatsoever for openness, transparency and non-discrimination.*

*A review of the GPA is currently underway in the WTO, with new negotiations scheduled to start in early 1999. There is also an effort under GATS to set up disciplines in government procurement in services, and issues related to transparency in national procurement rules and regulations is being discussed in a newly established WTO Working Group. Meanwhile, an important first step in combating international bribery was taken when the 29 member countries of the OECD and five non-member countries (Argentina, Brazil, Bulgaria, Chile and the Slovak Republic) reached agreement in December 1997 on a Convention on Combating Bribery of Foreign Public Officials in International Business Transactions.*

### **C. Customs Procedures**

*Although the ITA commits participating countries to remove tariffs as well as other customs charges and fees, arbitrary or cumbersome customs procedures can continue to unduly interfere with IT trade at the border. Co-ordinated simplification and streamlining of national procedures would facilitate trade. Issues relating to customs practices and procedures that are most germane in an IT context include:*

- *long customs clearance time and complex paperwork requirements inhibit the timely and free flow of goods;*
- *not all countries, including some ITA signatories, accept ATA Carnets, which are customs permits which allow for the temporary importation of products and are usually used for trade show and demonstration goods.*

### **D. Protection of Intellectual Property**

*Intellectual property rights (IPRs), which include patents, trademarks, copyright, trade secrets, and industrial designs, have become an important area of policy discussion and convergence as the rate and cost of technological progress have risen sharply and as national borders have become more porous. Disagreements have arisen, however, not only over the stringency of national enforcement efforts, but also over the international “portability” of protection as well as over the relevance of certain fundamental concepts of IPRs. IPR challenges are particularly acute in the IT industry given its high technological intensity.*

*Technological change is occurring so rapidly and affecting such a broad spectrum of sectors that it is creating unprecedented pressures for change in intellectual property*

protection, even as the ink is barely dry on the Uruguay Round Agreement on Trade-Related Aspects of Intellectual Property (TRIPs). For example, because copyright protection was developed against the background of 19th century technology, the digital transmission of protected information today requires modifications in traditional approaches to copyright. This work is underway in the World Intellectual Property Organisation (WIPO), fuelled in part by commercial tensions that have manifested themselves under the TRIPs Agreement. Moreover, the time compression that results from rising R&D costs and shortening product cycles places a premium on strong and rapid protection of product or process innovations. Also, changes in technology occasionally result in inventions that either do not fit the old categories of patentable subject matter or cannot meet certain countries' requirements of patentability. Computer software programs, for instance, are considered to have the characteristics of mathematical formulas, which are not patentable in some countries. Semiconductor chip designs are perceived as not meeting the United States' criteria of novelty and "non-obviousness".

Technological changes can also make copying and production of IT products cheaper, quicker and harder to detect, raising a host of IPR and criminal enforcement issues, one prominent example being the complex negotiations that have pitted OECD countries over cryptography standards, which are key to underpinning the growth of electronic commerce and for reaping the full benefits of the information society. The blurring of traditional classifications of media through so-called multi-media products also carries potentially important and controversial implications, particularly as it has prompted some US industry associations to advocate duty-free trade for all copyrighted material regardless of the underlying media in which the content may be embedded and that copyrighted content delivered over the Internet be given the same treatment.

#### **E. Investment and Technology Transfer Requirements**

Industry representatives have voiced concern about the policies of certain governments to require that companies that wish to do business in their countries to invest and transfer their intellectual property to local firms. Such "forced transfers" of valuable technology typically involves sectors which governments regard as being strategically important, including electronics. They have been the focus of complaints which US suppliers of semiconductor equipment and materials have directed especially at China and various other Asian countries. The WTO Agreement on Trade-Related Investment Measures (TRIMs) does not address issues of technology transfer.

Other investment-related challenges arising in the IT sector and for which multilateral disciplines are either weak or non-existent include:

- the issues of subsidies granted to so-called "strategic" industries and related investment incentives, which the Uruguay Round Agreement on Subsidies and Countervailing Duties addresses only very partially and solely with regard to trade in goods.

*Meanwhile, multilateral disciplines on services-related subsidies remain on the GATS' drawing board, and little, if any, disciplines are expected to apply to investment incentives under the Multilateral Agreement on Investment currently being negotiated under OECD auspices;*

- discriminatory and non-transparent conditions of access to and use of government-funded technology consortia; and*
- broadly-defined (and self-judging) national security exceptions to non-discrimination principles.*

#### **F. Addressing Anti-Competitive Conduct**

*Trade can be inhibited or distorted also by a host of (often less visible) private and public restrictions to competition. In fact, certain IT sectors exhibit highly concentrated industry structures and complaints about less visible anti-competitive private practices, such as price fixing, abuse of a dominant position, market sharing arrangements, restrictive licensing arrangements or exclusive dealings, are frequently voiced in this sector. In fact, as protection afforded by traditional trade barriers are falling, businesses (including cross-border alliances) may have an incentive to engage in private restrictive conduct that deters market entry by new competitors and limits the benefits stemming from the removal of border measures. This may be particularly true in countries with weakly developed or poorly enforced national competition regimes. It is this risk which is driving the increasing international focus, in the WTO and elsewhere, on restrictive business conduct and its regulation. In turn, it raises the question of whether competition policy should not also be made an integral part of any further trade liberalisation discussion in the IT sector.*

*The GATS Agreement on Basic Telecommunications Services, whose regulatory commitments include competition policy provisions based on the principle of positive comity, could also be a model applicable to trade in other IT products. The Agreement's provisions that relate to competition policy provide essentially for positive comity-type consultations among parties to the Agreement, and the enforcement is by means of national laws and regulations. At the request of another party, each party to the Agreement is to engage in consultations with a view to eliminating restrictive practices within its territory. By focusing attention on the need for pro-competitive conditions of interconnection to the networks of dominant suppliers of telecommunications networks and services, the Agreement also marks significant multilateral progress on issues relating to abuse of dominance. The IT sector could usefully serve as a case study for the ongoing discussions of the interaction of trade and competition policy by the Working Group set up by the Ministerial Conference of the WTO in Singapore.*

*Another, more controversial, non-tariff issue arising from the interface of trade and competition policy is whether competition policy principles could not be used to regulate dumping and the application of antidumping measures by importing countries. This issue is particularly relevant for the ITA and follow-up work, because IT products have been a prominent target of antidumping measures taken by certain industrial countries. IT products (particularly in the consumer electronics' market segment) affected by antidumping measures in recent years have included personal fax machines, diskettes, microwave ovens, display panels, and supercomputers. For the EU, consumer electronics ranked second after textiles and footwear products in terms of the number of antidumping investigations initiated between 1994 and April 1997. Proliferation of such measures could effectively nullify the liberalising effect of the ITA.*

*While antidumping measures aim at neutralising unfairly low-priced import competition (price discrimination), such action can stifle competition itself - especially since existing rules do not require a "competition test" that would limit the application of antidumping measures to cases where dumping seriously imperils competition in the market (so-called economically harmful predatory dumping). Moreover, foreign exporters are not the only ones antidumping measures affect: decisions under current trade laws to protect one segment of a country's IT industry (intermediate inputs) often damage other segments of the industry (downstream producers) whilst ignoring the interests of consumers or buyers.*

The challenge that NTBs pose for negotiators of an ITA II are formidable. To begin with, many NTBs do not lend themselves easily to straightforward liberalisation formulas but call for the development and implementation of what are often highly complex rules. Second, the packaging of NTB negotiations so as to allow for cross-issue trade-offs is probably unavoidable. The reason being that there are great cross-country variations in the roles played by government policy, and in the policies themselves. Moreover, countries differ in their rankings of the relative importance of various NTBs. For instance, the EU's telecom industry, long accustomed to state tutelage, does not give as high a priority to the task of opening up procurement practices by public telecommunications operators as does the US industry. For it, market structure and product standards pose more significant obstacles to market access in the US, Japan and Canada. Both the US and the EU have long complained about anti-competitive private practices in Japan and other Asian countries, yet neither of them has been willing to examine the anti-competitive effects of repeated anti-dumping duties, which frequently target Asian producers of industrial or consumer electronics. Given its current competitive strength, the US industry has not generally been in the mood for seeing market dominance issues in IT brought into the realm of WTO negotiations. Yet for players other than the US, particularly smaller countries trying to gain market share in fast-growing markets, these issues, together with intellectual property aspects of new-generation IT products, remain potentially important market access issues for which a multilateral rule-making response may be desirable.

The more comprehensive move towards “horizontal sectoralism” that an ambitious ITA II would herald on the NTB front, involving as it would a much broader and technically complex range of regulatory impediments to market access, is a far cry from the expedient, and hence politically attractive, “no-brainer” the ITA’s first incarnation embodied through its limited, “vertical”, focus on tariff elimination.<sup>96</sup> More broadly, the question arises of the usefulness - and the bureaucratic costs - of addressing non-tariff measures on a sectoral basis. The incidence of NTBs is typically multi-sectoral in nature and scope. Obstacles to trade relating to technical standards and regulations, which are often highly product-specific and where mutual recognition arrangements have been negotiated on a sector-by-sector basis, may be an exception in this regard. In the ITA II context, the goal would be to transcend bilateral confines and negotiate plurilateral mutual recognition arrangements.

Adding to the above challenges is the fact that NTBs are governed by - and would thus need to be outsourced to - a diverse range of WTO disciplines and agreements. Sector- or issue-specific negotiations and co-ordination would thus potentially need to run the gamut from the Agreement on Technical Barriers to Trade (TBT), the General Agreement on Trade in Services (GATS), the Agreement on Trade-Related Aspects of Intellectual Property (TRIPs), the Agreement on Trade-Related Investment Measures (TRIMs), to the Government Procurement Agreement (GPA).<sup>97</sup> Adjustments to and extensions of these various existing disciplines would require the approval of countries that are not signatories of the ITA (and who are only observers to the ongoing discussions of the WTO Committee of Participants in the Expansion of Trade in IT Products).

At the end of the day, the conclusion seems inescapable that only tariff-reduction exercises can be neatly pursued on a product or sector-specific basis and that more comprehensive, multi-sectoral, negotiations are needed to tackle the murkier world of non-tariff/regulatory impediments to market contestability.<sup>98</sup> Given the inherent complexity of the issues at hand - as shown vividly by the oft-delayed and protracted bilateral negotiations on the recently-concluded US-EU Mutual Recognition Agreement on product

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<sup>96</sup> Although the Agreement’s negotiating history does show that some countries were able to broaden the “bargaining space” somewhat beyond tariff- or indeed IT-related matters.

<sup>97</sup> The fact that the membership of the GPA differs significantly from that of the ITA adds a further complication, all the more so as procurement barriers, particularly of telecommunications equipment, are of considerable significance in the IT sector.

<sup>98</sup> One should also bear in mind that, notwithstanding the ITA and the WTO agreement on basic telecommunications), most sectoral negotiations conducted at the plurilateral or multilateral levels have yielded disappointing outcomes or led to recurring - hence unresolved - commercial tensions, be it in the case of trade in steel, bovine meat, dairy products, maritime transport, or of the elimination of subsidies on civil aircraft or shipbuilding.

testing, inspection and certification (including for a range of telecommunications equipment and IT products), it is likely that all that can be expected on NTBs by the July 1998 ITA II deadline is a preliminary discussion and illustrative inventory of issues. Indeed, suggestions have already been made, notably by the US Information Technology Industry Council (ITI), to basically limit the NTB dimension of ITA II to a simplification of product certification procedures (over and above broadened product and country coverage).<sup>99</sup> Without discounting the commercial value of progress along the product certification front, it is still unclear whether concrete results may be forthcoming on NTB issues in the absence of a more encompassing negotiating agenda. ITA signatories might however focus discussions in their WTO Committee on the necessary substantive and strategic preparations that would ensure that IT-relevant NTBs will indeed be addressed (along with other IT-specific issues) in future multilateral negotiations.

As noted earlier, there has been a paradoxical tendency since the conclusion of the ITA to hail the Agreement as a victory for sectoralism while claiming that IT is a “special” sector, the defining features and circumstances of which cannot be easily replicated. It is certainly true that a confluence of factors conspired to bring about the ITA in a remarkably short period of time. The first of these is obviously the prevailing determination of the US that the Agreement be solely concerned with tariffs. This may not be feasible for other sectors on the US wish list, and is not relevant in services sectors, where a more horizontal, ITA II-type approach, will by definition be required. Of crucial importance was also the fact that the ITA was a business-driven initiative from start to finish and that it captured early on the imagination, support and lobbying time of world leaders, principally President Clinton, Sir Leon Brittan, Prime Minister Hashimoto and, in the APEC context, President Ramos of the Philippines. The flexibility shown in the end by the US government on the issues of product coverage and staging for developing countries was also vital; as was the fact that, when confronted with a hard choice at the end of the day in Singapore, the US simply wanted an ITA far more than it wanted the setting up of a WTO Working Party on the relationship between trade and labour standards. This aspect, together with the brinkmanship shown by the EU in securing linkages with semi-conductors and distilled spirits, gave lie to a significant degree to the claim that there is no need for linkages and trade-offs to bring a negotiation -- even in a sector with as high a feel-good factor as IT -- to a successful conclusion.

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<sup>99</sup> ITI members have called for the adoption of the principle of “One Standard-One Test, Supplier’s Declaration of Conformity for world-wide acceptance of IT products, noting that the main NTB barriers the industry confronts include: (i) duplicative testing, certification, or other technical requirements for IT products that have already been tested and certified to equivalent standards elsewhere; (ii) duplicative mandatory accreditation of testing laboratories, including manufacturers’ laboratories, that have already been accredited to international guidelines; (iii) non-transparency of regulations, including certification and labelling requirements, with respect to technical requirements, product coverage, procedures for attesting to compliance, notification, points of contact; and (iv) technical regulations that force disclosure of intellectual property, such as audits, plant inspections, and requirements for detailed technical documentation. See Information Technology Industry Council (1997), *Information Technology Agreement (ITA) II - Recommendations on Technical and Regulatory Barriers to Trade*, Washington, D.C.: ITI, (14 July).



Moreover, the extent to which the ITA came to be regarded by a sufficiently large number of WTO members in late 1996 as a necessary face-saver for Singapore should not be under-estimated. For APEC, earlier ideas about Subic Bay producing a clarion call to the WTO to adopt the 'APEC' goal of global free trade by 2010/2020 in Singapore had faded quickly in the face of implacable US hostility towards such "vague visionary-ism". The ITA by contrast offered the prospect of a concrete downpayment on both that global goal and APEC's own regional goal. It was also the only liberalisation initiative with any chance of immediate success in a Singapore WTO Ministerial Conference agenda heavy with "information exchange and analysis" but little else on either established or new issues. All these have been facilitating factors which in this negotiating exercise outweighed at least two potential roadblocks to trade liberalisation. First, both the US and EU have been running large and recurring trade deficits in the sector, which usually makes further market-opening measures unpopular at home. Second, while NTBs reportedly constitute the primary obstacles to market access in Japan, where tariffs are almost non-existent, there was no insistence that Tokyo make commitments here in order to "pay" its way into the ITA.

Nevertheless, in a number of ways the ITA represents a decisive break with past GATT negotiating modalities. It is the first GATT/WTO tariff deal to be buttressed by a Declaration containing both detailed modalities spelling out how to bring it into effect and a forward-looking work program. It drew unprecedented positive political and public recognition and support for trade liberalisation at a time when the multilateral trading system badly needed it. It exploited regional and other trade policy caucuses such as APEC, the Quad and the G7 in a constructive and successful way to build global consensus on a successful and timely deal. It employed a quantitative benchmark of "critical mass" in the form of a share of world trade that had to be covered as a condition for entry into force, thereby achieving an MFN deal without undue free-rider problems or weakening of non-discrimination rules to counter that.

Still, at the end of the day, the ITA is not truly a "stand-alone" deal as the concept used to be understood up until the end of the Uruguay Round (i.e. the elimination of tariffs in the same and proximate harmonised system classification chapters); but rather a repackaging of a number of product groups under a catchy name. In this era of globalisation and the heightened importance of public opinion, these novel and defining features of the ITA are lessons worthy of study by trade negotiators, business people and politicians. It is possible that the symbolic, forward-movement, qualities of an ITA-type initiative, focusing as it may on barriers of secondary or declining importance, might well be needed every few years. Such initiatives might even spearhead future WTO rounds from now on. The best bet for smart money for the next such initiative, most probable at the beginning of the new millennium, (and following up on the hard bargaining that a

successful ITA II on NTBs would imply and the still uncertain fate of ongoing negotiations on financial services), could well be an ITA III, the agreement's acronym standing next time as short-hand for "Internet Telephony Agreement"!