

# Regional free-trade areas: sorting out the tangled spaghetti

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**Abstract** As a result of the difficulties in negotiating the liberalization of trade globally, countries seek liberalization among smaller groups. We describe open regionalism as one such attempt to do this, and show why after a decade of success it ran into the ground as a strategy. The formation of discriminatory regional free-trade areas (FTAs) is sometimes seen as another response to this problem. This paper point out what is wrong with this response—that it distorts trade patterns and thereby sets up an unpleasant prisoner’s dilemma—and suggests some ways forward. We propose the formation of open trading arrangements (OTAs) and the establishment of a Trade Transparency Commission in each country that is participating in an OTA. We also suggest global regulation of trade diversions caused by all FTAs, whether OTAs or not. Ultimately, the return to health of the global trading system will require expanded understanding of the basic insight of economics, that liberalization enhances the welfare of citizens of the liberalizing country.

## I. The problem

Negotiation of World Trade Organization (WTO) Rounds of trade liberalization is now very costly. This is partly because it involves so many participants. But, in addition, the economies of many of participants are very different, and so there are deep conflicts about objectives among the different players. Furthermore, the institutional weakness of the WTO makes

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it difficult to bring about effective bargaining between the participants. These issues are discussed in the article by Hoekman and Vines (2007) which opens this issue of the *Oxford Review*, and by other authors.

Alongside this global-system failure, countries have been tempted to seek liberalization among smaller groups. 'Open regionalism' is one such response, which was pursued in the Western Pacific in the 1990s. That process sought to encourage unilateral liberalization among groups of countries, without discrimination against outsiders. The result was a decade of achievement, but this process is now, sadly, at a dead end. The current pursuit of discriminatory free trade areas (FTAs) is a different, early-twenty-first-century response. Many initially saw this approach as providing a stepping stone to global free trade. But, as time has passed, people have come to think that this approach has, instead, created a spaghetti bowl of distorted trade relationships. Increasingly, people have come to see the resulting distortions as very costly, and to see them as an obstacle to, and diversion from, further progress.

This paper aims to point out, historically, just why this happened. It also seeks to describe, analytically, just why the resulting prisoner's-dilemma outcome is so bad. And it concludes by suggesting some ways out of the resulting mess.

There are other activities which the WTO carries out—it provides a forum for discussing and settling disputes, and it acts to constrain backsliding on liberalization already undertaken. These functions are in reasonably good health, and we will not discuss them here.

## **II. Open regionalism**

### **(i) The advantages of simultaneous liberalizations**

Of course, one possible response to the difficulty of fixing the WTO is unilateral liberalization. This has been richly rewarding to those economies which have embarked upon it, as economic theory suggests that it should be. These benefits are briefly discussed in section I of Hoekman and Vines (2007).

Foreign economies benefit from the liberalization of trade with a liberalizing country. And so there are advantages to a country if it liberalizes at the same time as others liberalize. As discussed by Hoekman and Vines, these advantages are of two kinds.

First, if a country liberalizes by itself then it will suffer from the switching of the demands of its own residents away from its own goods and towards imports. That will, *ceteris paribus*, cause its terms of trade to deteriorate. By contrast, if a group of foreign countries liberalizes at the same time as the home country liberalizes, then there will be an increase in the demand for the home country's exports, raising the prices of those exports. This will, *ceteris paribus*, counteract the deterioration in the terms of trade that its own liberalization causes. That will increase its real per-capita income, compared with what would have happened otherwise. In sum—by liberalizing at the same time as a group of other countries, a country can seek to defend itself from the terms-of-trade difficulties, and real income losses, which its own liberalization might cause. The main strength of this argument is its amenability to formal exposition, which gives it a privileged place in economic theory. For most countries at most times, the real economic effects of deterioration in terms of trade as a result of domestic trade liberalization are small—usually insignificant—compared with the resource allocation and competitive gains from liberalization. In practice, such terms-of-trade effects rarely seem to motivate trade-policy decisions: in the few cases where terms-of-trade advantages from restricting trade would seem to be large—United States agriculture and Chinese manufactures, for example—the policy response has been to subsidize the export or production of commodities whose international price would fall with export expansion.

Be that as it may, the argument has been given legitimacy by theory and has to be taken seriously.

The second argument, which we think is substantially more important, is a political economy one. There are domestic political difficulties in the face of such liberalization. These arise from the overweighting of the interests of those producers seeking protection in the determination of national trade policy. In the absence of clear-sighted and strong leadership these difficulties can be decisive. Participation in international discussions and negotiations about trade liberalization can be used as an argument at home in support of liberalization. That is to say, the prospect—and, better still, the contemporary reality—of liberalization by others abroad, especially if they are important regional trading partners, can be used persuasively by trade-policy officials and politicians as they embark on the contest with protectionists at home over liberalization. This leverage was useful during the period in which virtually all Western-Pacific economies embarked on far-reaching unilateral liberalization in the high tide of internationally oriented growth in East Asia, from the mid-1980s to the eve of the Asian financial crisis in 1997.

These two ideas, particularly the second, lay behind the strategy of ‘open regionalism’, from the mid-1980s to the middle of the 1990s, in the Asia-Pacific region of the world (see Garnaut, 1996; Drysdale *et al.*, 1998).

## **(ii) Open regionalism as a strategy**

Open regionalism was initiated as a strategy by Bob Hawke, then Prime Minister of Australia, in a speech in Bangkok in 1983, and used explicitly to launch the idea of Asia-Pacific Economic Cooperation (APEC) in a speech in Seoul in 1989. His proposal to move in this way was a response to the difficulties which were then being experienced in launching and then making progress in what had become by 1989 the Uruguay Round of trade negotiations, in much the same way as difficulties are currently tying up the Doha Round. (The Uruguay Round did not reach completion until 1993.) Australia’s initiative—quickly followed by moves by other countries in the Asia-Pacific region—led to the creation of the APEC process. This embodied a new approach to trade policy among a growing grouping of countries in that part of the world.

In the Asia-Pacific liberalizing ‘open region’, a group of countries sought to liberalize trade collectively. That is, they sought to reduce restrictions on *all* imports, on a most-favourednation (MFN) basis, whether or not those imports came from within the region. The process is best described as ‘concerted unilateral liberalization’—which became the term used to describe what was happening within APEC.

<sup>1</sup> Arguments used include the following: (i) adjustment costs in responding to trade liberalization, even if the eventual outcome is a potential Pareto improvement; (ii) distributional objections to liberalization (Stolper–Samuelson, specific factors, etc); (iii) the infant-industry arguments for protection; and (iv) riskmanagement issues—the need to accompany a move to openness with better social safety nets (see Kanbur and Vines, 2000).

It is true that there are internal collective-action difficulties in the face of such liberalization. In such a process, there is no *explicit* guarantee that demand for a country's exports will increase at the same time as the country shifts its own domestic demand towards imports. This is because the trade liberalizations are all happening separately and are only loosely coordinated. There is also in this process no *explicit quid pro quo* which officials in a liberalizing country can 'offer up' to domestic protectionist interests, in seeking to convince those interests that liberalization is desirable—or at least acceptable. Nevertheless, if a large enough group of countries liberalizes together, in a large enough 'open region', then increased demand for a country's exports, coming from the liberalization in other countries, is likely to compensate the country for the switching of domestic demand away from home goods and towards imports, which happens as the country itself liberalizes. And it will be possible to persuade domestic protectionists that this is likely to happen. During the widespread Western-Pacific liberalizations starting in the mid-1980s, the sheer facts of trade expansion throughout the region provided powerful arguments of this kind.

In the decade prior to the Asian financial crisis, such 'concerted unilateral liberalization' created a momentum of liberalization right across the Western Pacific. Each of China, Thailand, Indonesia, the Philippines, Malaysia, Australia, and New Zealand embarked on major unilateral liberalizations, far beyond anything that was done in the Uruguay Round. North-east-Asian countries—Japan, Korea, and Taiwan—implemented substantial unilateral liberalizations in manufactures, but needed the Uruguay Round for the largest (but not all) of their steps in agriculture. Hong Kong and Singapore did not do very much during this period, but these economies were already as open to trade as almost anywhere.

The culminating moment of the APEC push in this direction was the Bogor Declaration of 1995, which committed OPEC members to free and open trade by 2010 (for its developed country members) and 2020 (for developing countries).

Nevertheless, the meeting in Bogor was also a case of (as the Chinese say), 'same bed, different dreams'.

Most Western Pacific countries at the Bogor meeting believed that what had been agreed upon was an open-regionalism process of trade liberalization, along the lines of that described above. In subsequent APEC meetings in 1996 (in Osaka and Manila) it was agreed that moving towards an FTA, with discrimination against outsiders, was *not* what APEC would do, and that the way forward really was 'open regionalism' (see Garnaut, 1996). But those from North America at the Bogor meeting did not share this vision. Led by Fred Berstgen at the Institute for International Economics in Washington, they had in mind a plan for a conventional FTA. The USA and its North-American neighbours thus began to set out on a path of accelerated interest in bilateral discriminatory arrangements. This was—after all—the time that the North American Free Trade Agreement (NAFTA) was being consolidated.

It is worth setting out the reasons for this difference of view.

### **(iii) The undermining of open regionalism by the USA**

First, already under the influence of the creation of NAFTA, many from the USA held the view that bloc formation really was important as a way of leveraging trade liberalization in foreign countries; they were keen to encourage others to join them in benefiting from this, both because it 'would be good for them', and also to force the opening of foreign markets to American goods in a way not possible in the unstructured, and MFN, process of open

regionalism. At the same time, they tended to discount the trade diversion to which bloc formation would lead.<sup>2</sup>

Second, the strategy of open regionalism is vulnerable to a free-rider problem.<sup>3</sup> Countries outside the liberalizing group get access to the markets of liberalizing countries, without offering any liberalization themselves in return. For a country outside a process of open regionalism, staying outside may be the best thing that it can do—from the point of view of narrow political calculation (as distinct from the real economic interests of the country). It should simply hold out—rather than joining the countries in the liberalizing region and liberalizing itself.

The US players, particular Bergsten, were deeply aware of this free-rider problem. In Bergsten (1997), a paper published soon after the Bogor meeting, a theory of ‘open regionalism’ is presented, which is not ‘open’ at all. ‘Why should we collaborate in a process of market opening in Asia which gives the *French* extra access to our markets?’ Bergsten, and others in the US policy-making process in the mid-1990s, while claiming to liberalize and to promote ‘free trade’, also aimed to remain sufficiently protectionist that they would have something to use ‘against the French’ (we speak metaphorically) if ‘the French’ did not somehow offer something in return. Indeed, one can see the reasons for this position. The USA, with its hegemonic power, and its unequalled influence, through the exercise of this power on the policies of others, may have had legitimate concern that its own participation in ‘concerted unilateral liberalization’ with one set of countries would reduce its influence in seeking reductions in protection in others.

For some years before and after the Bogor meeting, there was a degree of compromise between the two positions. As already noted, concerted unilateral liberalization made considerable progress within the Western Pacific until 1997. Nevertheless, countries which were unilaterally liberalizing chose to do so mainly in industries in which the increase in imports that resulted from the liberalization would be disproportionately concentrated on sectors and commodities in which protection was already lower than average. A few highly protected industries—for example, agriculture in Japan, Taiwan, and Korea—remained highly protected. It was clear both to advocates and to critics of open regionalism, that any final move towards free trade in 2010, or 2020, would be contingent on moves towards greater openness in the rest of the world. The final scene of implementation of the Bogor Declaration was designed to have the WTO as a stage.

One of us, in a lecture given more than 10 years ago, and a year *before* the Bogor conference (Vines, 1994), provided an extended discussion of the difficulties involved in this compromise and the need there would be, in the end, to make a choice between the two alternatives. Given the importance of the USA in the region, it was always the intention of the key players in the region to involve the USA in any region-wide trade-liberalization strategy. And in the era of greater doubt about economic openness, in the immediate aftermath of the Asian financial crisis, the position of the United States, and the example which it gave,

<sup>2</sup> We are grateful to Anne Krueger for insisting to us, in discussion, that this view contributed to the thinking in the USA at the time, and that it was a view held by William Brock, the US Trade Representative from 1981 to 1985. She was already sceptical about the benefit of FTAs, setting out some of the arguments presented in the current paper in a paper on rules of origin (Krishna and Krueger, 1995). See also Krueger (1997, 1999). At the meeting in Manchester at which the current paper was first presented, in February 2006, Krueger described how the caution about FTAs, expressed in that paper of hers, was opposed in the US academic and policy community at the time.

<sup>3</sup> See Sinclair and Vines (2006).

became more influential. This eventually meant that the USA had the power to determine the future of open regionalism as a regional strategy.

Developments in US policy, and the regional response to them, killed this strategy at the turn of the century.

### **III. The move to FTAs—led by the USA**

The *need* to do something about supra-national trade liberalization became even more urgent with the failure of the WTO summit at Seattle in 1999. And the *wish* to do something about this, in a way which the USA would *lead*, was propelled by the election of a new administration in the USA in 2000. Immediately after the election, the USA moved decisively in the direction of FTA creation. The consequence was immediate. Since late 2000, the proliferation of conventional, discriminatory FTAs has been the main trade-policy game throughout the Asia-Pacific region.

#### **(i) The FTA move and the imposition of free riding**

Since 2001, the new US administration has set out itself to create bilateral and regional FTAs with partner countries, i.e. trade blocs which are discriminatory. In such blocs, trade is liberalized within the bloc, but not with those outside. Of course, the USA had experience of going this way in the face of difficulties in the earlier Uruguay Round of trade negotiations. NAFTA was created with Canada and Mexico well before the Bogor meeting in 1995.<sup>4</sup> And moves in this direction in the past 5 years have been important. A discriminatory FTA was established early on between the USA and Singapore. And such an FTA was also signed in 2004 between the USA and Australia. The latter has now abandoned its enthusiasm for ‘open regionalism’, and so has withdrawn an influence which was important for the energy underlying APEC long beyond its initial foundation and well into the mid-1990s.

One can also describe such moves as imposing free riding on the rest of the world. This is because, as is well understood, the creation of FTAs leads to trade diversion as well as trade creation. One might imagine the USA and its partners saying the following: ‘Of course a WTO deal is important. But such deals are difficult to bring about. And meanwhile we will fix something for ourselves, pursuing trade liberalization with our friends through the formation of FTAs with these friends, in search of the “trade creation” which such an FTA can bring. Of course, such an approach does lead to trade diversion, but, well, too bad, this is the best that we can do in the circumstances.’

It is widely believed that, when *one* such bloc is formed, the effects *on the welfare of the members of the bloc*, of the creation of that bloc *alone* are positive. Thus it is widely believed that, for the participants, the effects on welfare of the trade creation to which NAFTA has led have dominated the effects of the trade diversion to which it has also led. This view largely comes, we believe, from the experience of the European Union (EU), in which trade creation has been very substantial. But the EU has undoubtedly also caused trade diversion

<sup>4</sup> NAFTA was also, importantly, a response to the problem of how to stem the flow of Mexican immigrants into the USA—it enabled people to stay in Mexico, while enabling Mexican exports produced by them to enter the US market more easily.

(most egregiously in agriculture, but also in other industries) and it is surprising how much this distortion has been ignored. And there are other examples of such diversion, such as the fact that imports of textiles from Mexico have displaced those from China into the USA, and that Canada's trade with the Asian countries has grown much less rapidly than it might have been expected to grow, and certainly much less rapidly than Australia's trade with the Asian region has grown. Nevertheless, the US view has been that—for both itself and other members of the blocs that it creates—the creation of these blocs is a good step forward. The USA has sought to make a further *systemic* argument—that the creation of such blocs is a useful stepping stone towards more trade liberalization at the global level. Famously, the Special Trade Representative in the first Bush administration, Bob Zoellick, argued that such small-group FTAs provide an 'alternative route' to more liberal global trade to the one provided by the complex unsatisfactory global negotiations at the WTO.<sup>5</sup> The formation of such blocs appears to offer a path to liberalization with a much shorter timetable. Potential partners with the USA, for example Australia, have seen this apparently speedier route to trade creation as attractive. More than this, it appears to the USA that progress on the 'Singapore issues' (in particular, intellectual property, investment, and government procurement) might be achieved faster in such bilateral negotiations than it could globally. (See below for a discussion of aspects of this issue in the case of the USA–Australia FTA.) And, finally, it has been argued that such preferential moves help to create, globally, a process of 'competitive liberalization', in which countries seek to emulate each other's pursuit of the benefits of liberalization.

Overall, there has been much pressure from the USA for selected countries to form FTAs with the USA, coupled with assertions by the USA that such moves could act as stepping stones to globally freer trade.

## **(ii) Difficulties with this kind of free riding**

In fact, this free riding has turned out to be quite difficult to organize—'the best that we can do with our friends in the circumstances' has turned out to be not very good. There is an important analytical reason for this. When one is playing the game of non-unilateral trade liberalization, all free riding must be done *in teams* of at least two players. In the face of *differences of objectives among potential free riders*, free riding, of a kind which is Pareto-improving for all of the free riders, turns out to be difficult to arrange. These are four aspects to this.

First, as already noted, bilateral FTAs in their nature contain welfare-destroying trade diversion as well as welfare-enhancing trade creation. The political economy of the policymaking process tends to push these blocs towards trade diversion and away from trade creation. This is because the trade creation brought about by an FTA has its costs for the producers for the home market, the demand for whose products is reduced by the increase in imports which happens when the bloc is created; the political economy of the policy-making process tends to emphasize these costs. As a result, those seeking to establish FTAs tend to avoid establishing blocs with partners that would lead to high levels of trade creation. An example is the avoidance by Japan of a Japan–USA FTA, or a Korea–Australia FTA, because of the difficulties to do with agriculture. In addition, negotiators also seek to make

<sup>5</sup> Anne Krueger has said to us that she believes that this position has been part of the views of those in the USA in favour of FTAs since long before the election in 2000.

exceptions for sectors which would involve high levels of trade creation. An example of this is the complete exclusion of sugar, and the gradualism to the point of imperceptibility in other major agricultural products, in the USA–Australia FTA, and in US indications of acceptable limits in any FTA with Brazil. None of the established or mooted FTAs has considered reductions in agricultural subsidies as a part of the agreement. Also, some market-opening decisions are harder to take in a bilateral than in a multilateral context. Thus difficulties over access to American agricultural markets in the setting-up of the USA–Australia FTA might have been easier to deal with if, say, European pressure and reciprocal offers could have been brought to bear during the negotiations. By contrast with all of this, there is no domestic lobby whose role in the political economy of the policy-making process is to emphasize the costs to the members of the bloc coming from trade diversion. Thus, on balance, the political process pushes bloc creation in the direction of trade diversion.

Second, the creation of small-group FTAs, in fact, has mainly negative effects on the political economy for subsequent multilateral liberalization. This happens for an important political-economy reason. Those benefiting from the trade diversion will, of course, be threatened by further multilateral trade liberalization—precisely because they are inefficient suppliers of these goods compared with the most efficient suppliers in the rest of the world. They will, thus, resist the erosion of their regional preferences which would happen with multilateral WTO liberalization. It has been suggested that Mexico may have been influenced by such considerations in Cancun. Those developing countries with preferences in Europe, particularly countries in Africa, have always sought to resist the multilateral liberalization of European agricultural trade. Fiji and other South-Pacific countries have asked for compensation for the effects of unilateral liberalization on their margins of preference in the Australian market.

Third, the rules of origin that are required to protect the preferential privileges in an FTA are themselves a source of distortion and economic loss. For this reason, even a complete matrix of bilateral FTAs, with strands of spaghetti joining every country with every potential trading partner, would not produce welfare effects that were in any way comparable to multilateral free trade. Transactions costs in international trade and investment would be very much higher, and trade in final goods and intermediate goods would be distorted into sub-optimal patterns by arbitrary incentives created by these rules of origin. Of course, industries supported by rules of origin add to the pressures against further liberalization described in the previous paragraph.

Finally, it appears that the USA today views access to the US market as a benefit which should be granted preferentially to supporters of US foreign policy on whatever are the big issues of the times. Such an approach politicizes moves towards further trade liberalization, and introduces a risk that political and cultural divisions will be exacerbated and entrenched.<sup>6</sup>

### **(iii) The Australian example**

The Australian case makes clear how hard it is for countries forming an FTA with the USA to get a good deal. There are three points to make about that FTA.

(i) Some primary commodity sectors have been left out because of protectionist pressure in the USA. Australia was simply told ‘no sugar exemption, no deal’. The

<sup>6</sup> It is possible to read Kissinger (2001) this way.



liberalization of US imports of beef from Australia has been stretched over 18 years after the signing of the deal and, in any case, is subject to 'snap-back' arrangements (reversal) if US import growth exceeds some threshold.

(ii) It has become apparent that what is most important for the USA in this deal is not really 'more and freer trade', but instead the inflicting on Australia—and through this example eventually on others—of an economically indefensible extension of the protection of US monopoly power over intellectual property, particularly in the drugs, film, and publishing industries. There is already significant pressure on the official processes for determining drugs prices in Australia, as a result of the agreement. Some suggest that the most important thing for the USA about the Australian deal was to give it practice in extracting monopoly rents on drugs, so that it could get ready for trying to do this in Canada. Australia, as a result of the agreement, has replaced economically more-efficient copyright laws with US laws that have been the subject to widespread condemnation by the US economics profession.

(iii) The rules of origin in the USA–Australia deal have been written in a way which in practice discriminates against Australia. Take cars. The very inefficient car industry in Australia of 20 years ago (too many producers serving a small protected market very inefficiently) has recently been rendered much more efficient by import liberalization taking a lot of components from abroad, and exporting a high proportion of its products to a wide range of countries. Since Australia is a small economy, a quite high proportion, call it  $\alpha$ , of the components for these Australian-made cars must necessarily come from abroad. The rules of origin on cars in the USA–Australia FTA deal have been written so that to get into the USA tariff free, cars from Australia must have had a proportion  $(1 - \alpha + \epsilon)$  of their value added in Australia or the USA.

Thus, most car production in Australia cannot benefit from the creation of the FTA.

The rules-of-origin document associated with this agreement is immensely long and complex, modelled on the NAFTA rules of origin, which themselves emerged from the protectionist processes of US politics. A sceptical reader might wonder whether it is so long precisely so as to choose the appropriate value of  $\alpha$  for each industry, in the way described above. Of course, since the USA is large, many more components of US manufactures are themselves produced in the USA. So Australia was not able to play this game in reverse. This is one reason why political enthusiasts in Australia for the USA FTA prior to its coming into effect (but not the practitioners of economic analysis) have been surprised to find that Australian exports to the USA have not increased significantly, even in *nominal* terms, since the commencement of the FTA, at a time of considerable growth in US imports from the world as a whole.

#### **(iv) Difficulties for the USA**

For the USA, 'pursuing trade liberalization with our friends', has thus turned out to be rather difficult. This is partly because the USA negotiates in the way it has negotiated when forming the USA–Australia FTA. That is, protectionist groups in the USA have made potential membership of an FTA with the USA much less attractive than might at first have been supposed. This seems to be why the 'Free Trade in the Americas' initiative has all but collapsed.

## IV. Systemic risks—FTA creation as a prisoner's dilemma game

We have just reviewed the difficulties facing the USA and its friends in organizing free riding so that it is beneficial to them, when, on their own, they try to form FTAs. But these are as of nothing compared with the systemic problems which arise when others start to copy the behaviour of the USA.

The advocacy of FTAs, and actions, by the current US administration since early 2001 has generated just such a response in East Asia. That pressure has reinforced tendencies which had already been set in train in East Asia successively by the effects of trade diversion in NAFTA, by political incoherence in South-east Asia following the financial crises of 1997–8, and by the failure of the Seattle Ministerial Meeting of the WTO in 1999. The pressure has been reinforced by regional responses to this trade policy of the USA, first of all Australian responses. The outcome has been the transformation of East-Asian policy attitudes. East Asia was—as described earlier—the region of the world which, in the 1990s, was most committed to even-handed multilateralism. Within a couple of years at the beginning of the new millennium it became the locus of the most intensive discussion of discriminatory arrangements in the world. The failure at Cancún added momentum to this rush into FTAs in the East-Asian region.

### (i) Some formal theory: the prisoner's dilemma argument

It is first of all worth thinking conceptually about what happens when not one, but many, regions of the world start promoting FTAs. Krugman (1991) was the first to analyse what happens if all regions of the world seek to form such blocs. This form of analysis enables us to go beyond the arguments in section III, which considered only the formation of a single bloc in one region of the world, holding the behaviour in all of the rest of the world constant. We now consider the systemic consequences of what happens when lots of regions do this. Famously, Krugman obtained the result that welfare actually *falls* as the number of blocs falls. He showed that welfare kept on falling, as the number of blocs falls, all the way down to three blocs. This was eerily like the three-bloc world that seemed to be forming as he wrote. As he said in the introduction to his paper:

Casual empiricism suggests that the world is moving from the multilateral GATT [General Agreement on Tariffs and Trade] trading system towards the formation of three main trading blocs consisting of the European Union (EU), The North American Free Trade Agreement (NAFTA) zone, and a potential Asian bloc.

Some parameter choices of Krugman's model even suggested that welfare might be lowest when there were just two blocs left. This extreme result was striking, since—of course—if those two blocs were turned into one there would at last be global free trade and the best outcome possible.

Krugman's result is important. It is worth sifting through his argument with care, since, famous though his result was, he never explained it fully, and as a consequence his finding has been extensively criticized.

Krugman imagined a world in which initially there are many separate countries, say  $n$ , each with a positive Nash optimal tariff. These tariffs are not zero, because the  $n$  countries are assumed to produce differentiated goods and so to have some market power.<sup>7</sup> Krugman compares a number of situations in which this  $n$ -country world is first aggregated into  $n/2$  regions, each consisting of two countries, and then into  $n/4$  regions each of four countries, and then into  $n/8$  regions, each of eight countries, etc. Krugman's model is such that, at every

stage of this comparison, all countries in any *individual* group of countries that is proposing to form a bloc will, as their own bloc is formed, (i) gain from trade creation and (ii) also experience costs from trade diversion. In his model, for those considering the formation of a bloc, the effects from (i) dominate the costs from (ii), when considering the formation of their own bloc. By contrast, the rest of the world would lose from the trade diversion that would result from the formation of this one bloc.

Krugman's very striking result is that, when all countries form such blocs simultaneously, it is the case that, for any one country, the effects of trade diversion imposed on it by the formation of all the other blocs *outweigh* the benefits of trade creation that it gets from the formation of its own bloc. The pay-offs, said Krugman, really do make this look like a prisoner's dilemma. This is a world in which we might imagine that, at every stage, the Nash response of all players is to form blocs, so as to increase their welfare. (We have examined the real-world details of doing so in section III of this paper.) But when they all play Nash and do this, we might say, then they will all end up worse off. But we might imagine that they will keep on doing this over and over again, making the blocs bigger and bigger and fewer and fewer in number. At each stage the outcome would be one in which they are worse off: welfare keeps on falling as each bloc gets bigger and the number of blocs gets smaller and smaller.

There are two extensions necessary to the Krugman argument.

#### *The WTO constraint*

First of all, Krugman said that the reason that the pay-offs had the prisoner's dilemma structure—in which the costs of trade diversion dominate the benefits of trade creation as there are symmetrical moves to a smaller and smaller number of bigger and bigger blocs—is because he had supposed that as the blocs become bigger the monopoly power of the bloc in world markets increases and so its Nash optimal tariff rises. If countries really can raise tariffs, then it seems very likely that world welfare decreases as the number of blocs becomes smaller and they all become more protectionist. A complex model is not really needed to make this point. But it may be that tariff rates are 'bound' by the WTO. This would prevent countries from raising them, as Krugman had suggested that they might.

Krugman restated his argument, to make allowance for this point, in Krugman (1993). In doing so, he showed that a prisoner's-dilemma result is true even if the tariff rates of all players are bound at their initial starting rates. This is an important additional argument.<sup>8</sup> It is to do with the fact that in Krugman's model, international trade is conducted by consumers in search of variety, and that tariffs create distortions which prevent consumers

<sup>7</sup> Some people have argued that this assumption makes Krugman's model inappropriate, since most countries are so small that they do not have enough market power for their Nash optimal tariff to be much different from zero. But Krugman's argument can be recast so that the initial positive Nash optimal tariffs arise not from such market power. They might arise, instead, for political-economy reasons; because those determining trade policy set tariffs above zero because they wish to reward those producers who compete with imports. With this kind of recasting, the same argument can be made.

<sup>8</sup> Krugman only presents simulation results and does not explain this argument. We owe our understanding of it to Peter Sinclair of Birmingham University.

obtaining an optimal mix of varieties. Consider the first stage in Krugman's bloc-formation analysis. Before the formation of any blocs the consumers in each country buy the products which are produced at home free from tariffs, but they pay tariffs on imports from  $n - 1$  countries. This means that there are  $n - 1$  distortions, namely between the home good and all of the  $n - 1$  other goods. But after the formation of  $n/2$  two-country blocs, two sorts of goods reach domestic consumers tariff-free: those produced at home and those produced in the partner country. Tariffs are now only paid on the imports of goods from  $n - 2$  countries. But, nevertheless, there are now  $2(n - 2)$  distortions,  $n - 2$  distortions between home goods and all the  $n - 2$  other goods, and also  $n - 2$  distortions between goods produced in the partner country and all of the  $n - 2$  other goods. It is clear that when the bloc forms with four countries in it there are  $4(n - 4)$  distortions, which is a larger number. In this argument, everything is so symmetrical that after the formation of blocs there are no changes in the international terms of trade (because by assumption everyone is moving in the same manner in the creation of blocs). And, also by assumption, tariff rates are not changing. Thus welfare depends only on the number of distortions: the larger the number of distortions, all at constant tariff rates, the lower the resulting level of welfare. And it is easy to see that this number of distortions goes on increasing, as blocs are formed, all the way until there are only two blocs left. This simple argument suggests that the level of welfare will go on falling, as the number of blocs falls, right down to two. It takes more detailed algebraic analysis to show why the minimum for welfare might be reached when the number of blocs is three, but the general point is clear.

#### *Formulating the argument as a bloc-formation game*

The extension to the Krugman argument does not provide a formal treatment of the 'bloc formation game'. What he does is simply compare the outcomes when, by assumption, there are fewer and fewer blocs, each symmetrically larger. One should, instead, ask what blocs the players will choose to form. It is difficult to analyse this. At every stage, each country has to compute which of the many other countries in the world it will choose to form a bloc with. There are many possibilities.

Yi (1996) provided a method. He supposed, like Krugman, that all of the countries in the world are symmetrical. He imagined that they are arranged in some order, and supposes that the country at the top of the list is allowed to call out the names of all the other countries which it would invite to form a bloc with it. He showed, under some well-specified assumptions, that this country will invite more than half of the world's countries to form a bloc with it, but that it will not invite all of the countries in the world to join its bloc. The reason that this bloc-formation game does *not* give an outcome in which the world 'collapses' to free trade (as proposed by Zoellick and others in the discussion reviewed above) is as follows. Although countries in the big bloc will benefit from trade creation, by allowing others to join their bloc, they also benefit from having countries outside the bloc whose terms of trade they depress by protecting their home markets. Those countries can—as a result—be forced to sell things more cheaply to the large bloc, which is to its advantage. In addition, Yi showed that the countries remaining outside the big bloc will also choose to form blocs, rather than choosing to remain as isolated single countries. Indeed, he shows that they will choose to form at most two, and possibly only one, such bloc(s). It is striking that Yi's bloc-formation game leads to an outcome in which there are at most three blocks (which reduces to two for 'realistic' values of the number of countries). This is the kind of outcome in which, using Krugman's simpler model, welfare is actually minimized.

Yi's analysis supposes that as countries form blocs they can raise their tariffs against the rest of the world. It thus violates the WTO constraint, just like Krugman's original paper did.

But Mrazova *et al.* (2007) show that Yi's argument also is correct, in the presence of the WTO constraint, just like Krugman's argument does, for essentially the same reasons.<sup>9</sup>

### *Implications*

The *general* point to take from these papers is that welfare can go on falling as the world consolidates into fewer bigger blocs, essentially because as it does so the extent of interference with international trade will grow and grow. The *general* point to take from the papers by Yi and Mrazova *et al.* is that the world is likely to choose to consolidate into a small number of blocs in which world welfare will be depressed, possibly highly depressed. The theoretical models are too simple for us to be able to extract much more from them than this. But this clear message is a valuable one.

### **(ii) The prisoner's dilemma in the real world**

Many steps have already been taken down this route towards consolidation.<sup>10</sup> A number of FTAs have already been formed with Western-Pacific economies as members: Singapore–Japan; Singapore–New Zealand; Singapore–Australia; Singapore–USA; Australia–Thailand; Australia–USA; and China–Hong Kong. None of these is of huge importance in itself, although each adds new layers of complexity to these countries' relations with each other and with third countries, through the increase in transactions costs from rules of origin. More importantly, each adds credibility and momentum to the drift towards discriminatory trade in the Western Pacific and globally. At recent Association of South-east Asian Nations (ASEAN) heads of government meetings and ministerial meetings involving China, Japan, Korea, and India, announcements have been made that ASEAN would negotiate separate FTAs with each of these partners. While the ASEAN–China FTA was said to be still under negotiation, an 'early harvest' of duty-free access for fruit and vegetables came into effect from 1 October 2003, and is now having large effects on agricultural trade in both directions. This kind of move goes away from the desideratum of comprehensiveness as a guiding principle in the setting up of discriminatory trading blocs.<sup>11</sup> Negotiations are proceeding on Thailand–USA, Japan–Korea, Australia–China, New Zealand–China, Australia–NZ–ASEAN, from early 2006 Korea–USA, from early 2007 Japan–Australia, and several other bilateral FTAs. Following much talk and some action on single-country and ASEAN bilateral FTAs, discussion of an East-Asian FTA has risen in profile and credibility.

Evenett (2007) and others have argued that such moves can give rise to a self-reinforcing domino tendency. Once an FTA begins to form, firms within the region but outside the FTA seek competitive advantage from joining and lobby their government for this advantage.

Typically, the new FTAs breach WTO rules in one way or another. Generally, there are excessively long transition periods, or exclusion of significant areas of potential trade, or—in the case of the China–ASEAN 'early harvest'—the beginnings of trade discrimination in particular areas before there is a plan and a schedule for movement to free trade in substantially

<sup>9</sup> Mrazova *et al.* (2007) also show that, in the presence of the WTO constraint, the big bloc will be slightly smaller than it would have been without this constraint, essentially because if countries in the big bloc cannot exploit those outside as fiercely, by raising tariffs so much, then it may be worth letting more of them into the bloc so as to benefit from increased trade creation.

<sup>10</sup> See Gibbs and Wagle (2006) for a thorough presentation of the relevant facts.

<sup>11</sup> This is a guiding principle of Article 24 of the old GATT, and of the relevant article of the WTO.

all items. In no case has this been seen as a reason for hesitation on entering the FTA. The long transition periods in the Australia–Thailand and Australia–USA FTAs are examples of the breach of WTO rules.

So far as can be established from information on the public record, every one of the recently negotiated FTAs has different rules of origin from all other existing FTAs, and every one of the new FTAs still under negotiation is also to have different rules of origin from existing FTAs. Sometimes we cannot tell very much: for almost a year after the announcement that the Australia–Thailand FTA was executed, no information on the rules of origin was publicly available through official channels.

These moves in the Asia-Pacific region are creating obvious and major systemic risks for the international trading regime, risks which are perhaps especially large for developing, moderately sized, and small economies. There are serious risks for all Asia-Pacific economies. But there are also such risks for Europe and, indeed, for the USA itself.

### **(iii) The response to this problem in the USA**

The response by the USA to this problem, which it has helped to cause, has been confused. Until a few years ago, the USA believed that it could moderate such moves by ASEAN and by China through direct diplomatic pressure. In discussions it also appeared that US officials believed that discriminatory trading blocs, including those which break WTO rules, are acceptable, providing only that they are blocs of which the USA is a member. It is a good thing, if you are playing the prisoner's dilemma game, to aim to force everyone else to play on the diagonal, while you play off-diagonal. You can only do this if you are the global hegemon. But the events of 11 September 2001 have damaged the ability of the USA to conduct its trade policy in quite this way: the search for allies in the 'war on terror' has significantly compromised its ability to use trade policy so selectively. The response of Bergsten (2005*a,b*) is that the USA should continue to lead in this bloc-formation game. Until recently, one could argue that this strategy was not succeeding, and that the only real way forward was provided by means of progress in the WTO talks. But in early April, an agreement was struck for an FTA to be formed between the USA and Korea. This will, as and when it is implemented, lead to a significant liberalization of trade between the USA and its 11th largest trading partner.

In two policy briefs issued by the Peterson Institute for International Economics, Bergsten (2007*a, b*) argues that such a strategy, practised by the USA, is the best way to push towards an ultimate goal of globally freer trade, on a non-discriminatory basis. But one needs to consider the systemic effects of the policy of 'competitive discriminatory regionalism'.

Bergsten notes that Japan and several others have already indicated an interest in emulating the USA–Korea FTA, something which will produce a further substantial liberalization of trade and other barriers, perhaps including between the two largest national economies in the world, i.e. between the USA and Japan. But there are important subsequent questions to ask about what happens next. Would China wish to join an FTA with the USA, and with Japan, if one were formed between Japan and the USA? (And would domestic politics within the USA make such an FTA possible?) If not, might China, as a result of what is now happening, set about forming its own process of discriminatory regionalism? If the answer to these two questions is 'first no and second yes'—as we think it is—then we think that the world is in for difficulty. It is a prospect of global competition between two hub-and-spokes trading blocs, with the USA and China as the hubs.

#### **(iv) The response to this problem in Europe**

Bilateralism is not new to Europe. From its inception, the EU has used preferential arrangements as a way of binding potential members, neighbours, and former colonies of its member states more closely to it. From the arrangements with Greece and Turkey which date to 1963, through the FTAs with Spain and Portugal, and the countries of Central Europe, bilateral agreements have been part of the process of preparation for full EU membership. With the African, Caribbean, and Pacific countries (ACP), the approach has been to offer duty-free access (often subject to quantitative restrictions) to the EU market. Some of the ACP also received lucrative tariff-free quotas on sensitive goods, notably bananas, beef, and sugar, to substitute for lack of market access when their former colonial powers adopted the Common Agricultural Policy. And the other element in the EU's bilateral policy involved an attempt to avoid trade diversion coming from the FTAs of other countries. Hence the EU–Mexico and EU–Chile agreements, in which both sides tried to neutralize the potential trade diversion losses from agreements between the USA and Latin American countries. (See Rollo (2007) for a detailed discussion.)

But the EU effectively established a moratorium on launching new FTAs from 1997 to 2006. On that earlier date, the European Council of Ministers decided that 'the fundamental architecture of the EU's policy on preferential trade agreements has been put in place and should be preserved' (WTO, 1997). After the Doha Round was launched, this moratorium on FTAs implied that the EU's principal negotiating priorities were multilateral in nature and therefore not also diffused among different fora, as happened in the case of the USA after the policy change at the beginning of this decade, which has been described above.

But last year, Peter Mandelson, the EU's Trade Commissioner, announced that Europe would reverse its trade policy, and shift it towards the negotiation of FTAs. Part of the reason for this seems to be frustration at the slow process of the Doha Round. Pursuit of the 'Lisbon Agenda' of promoting technical change within Europe has been very slow. Increasing the openness of the internal market may be a means of assisting with this. Because progress in WTO negotiations has been slow, a European policy interest appears to have emerged in the formation of FTAs as an alternative way of opening the domestic market.

But, in addition, European export performance is not growing fast in rapidly emerging markets, particularly in South Korea and in ASEAN (European Commission, 2006). Furthermore, as discussed above, others are forming bilateral agreements in these areas, and Europe now seems determined to follow. It does appear that US policy, described above, is in part responsible for this shift in European policy (Rollo, 2007; Evenett, 2007). This shift in trade policy means that Europe will, in effect, be forming a third hub in the hub-and-spokes system which we described previously, which would give us a world consisting of three, competitive, hub-and-spokes trading blocs. Such might be the reward of the US strategy of 'competitive liberalization'.

#### **V. A new global response: creation of open trading arrangements**

We now make one suggestion for how the problems which we have discussed might be remedied: through the development of an open trading arrangement (OTA). An OTA could

be a framework on which all future FTAs are built. We have thought about this most clearly with regard to East Asia. But the idea may have global significance.<sup>12</sup>

An OTA would be governed by four principles.

(i) Membership of an OTA would be available to any country that agreed to meet the arrangement's rules.

(ii) Each member of an OTA would agree to extend to its partners terms of market access at least as liberal in each sector as it had made available to any other country in a preferential trading agreement.

(iii) Within an OTA, any new FTAs would embody the simplest and most liberal of the rules of origin among those who joined it. The ASEAN FTA would be a good model, with its across-the-board requirement for 40 per cent of value to be generated within the FTA. All members of OTA would accept value added within any OTA member as regional value added for rules-of-origin purposes.

(iv) In recognition of the reality that improved market access has little meaning if members apply subsidies for exports or production, all members would agree to constraints on trade-distorting subsidies.

The key conceptual ideas are principles (i) and (ii). An OTA would be an FTA that anyone could join. It would not be exclusionary. That provision—taken on its own—would provoke an instant rush for membership. It is hard to see that principle being, on its own, incentive-compatible for those within the bloc. However, this is importantly balanced by principle (ii). Any country seeking membership would have to give, to the existing members, terms of entry into its own market which were as liberal as it had given to any other existing trading partner. For example, Australia, which has a very liberal trading relationship with New Zealand, would need to give equivalently open access to its own market to other FTA members.

It is possible to see an OTA developing over time in a valuable way. Each of the members would be encouraged to provide OTA partners with liberal market access. However, the first objective of an OTA would be to reduce the practice and the costs of trade discrimination. For this objective, ease of entry for new members is more important than liberalization at the point of entry—all a country would need to do to join a bloc would be to offer the existing members access to its markets according to the terms of principle (ii).

As a result of this, the entry of subsequent members would not be the subject of demanding case-by-case negotiations, because of principle (i). Apart from acceptance of the OTA's rules of origin, the extension to other members of the most-favoured preferential arrangements that it had agreed with others, and the commitment to accept new members on these terms, each member would need only to offer market access to the extent necessary to meet the requirements of Article 24 of the GATT and Article 5 of the GATS (General Agreement on Trade in Services).

How a move towards OTA-creation would work clearly needs further study. An important question concerns the extent to which the asymmetries noted above, which would make it difficult for a country which had already made liberal concessions to join an OTA, would come to block the formation of such OTAs. As already noted, Australia, which already has a very liberal trading relationship with New Zealand, would find the requirement that it give

<sup>12</sup> This is the subject of a major piece of work by one of us, Garnaut, at the Australian National University. The following is a brief description of our proposals. See also Garnaut (2005).



equivalently generous access to its own market to other potential FTA members a demanding one. This kind of difficulty would inhibit the formation of OTAs to the extent that trade policy-making was under the influence of mercantilist or protectionist perceptions of the sources and distribution of the gains from trade.<sup>13</sup>

It is important, too, to recognize that an OTA could not be expected to deal with the problems of agriculture. In practice and in general, bilateral and small-group FTAs have been unproductive as vehicles for liberalization of agriculture. The major challenges of global agricultural protection lie in three different regions of the world: in North-east Asia, in the EU, and in the United States. These can only be addressed in multilateral negotiations, under the auspices of the WTO.

### **(i) Further strengthening of OTAs**

It would be possible to introduce two other elements into the OTA that would generate some tendency for liberalization over time.

First, each member could agree to establish an institution for transparent, independent analysis of the effects of trade-policy choices, along the lines of Australia's Productivity Commission.<sup>14</sup> This would not in itself involve new trade liberalization commitments. The Commission's function would be to raise awareness within each member country of the national rewards from reducing its own, domestic barriers, without having a direct role in the policy-making process.

Second, each member would commit itself to cooperation within the OTA to achieve a liberal outcome from WTO negotiations. OTA members would work through the WTO to achieve free and open global trade and investment by a definite date.

Would membership of an OTA be attractive? For all members, it would reduce, and, if and when OTA's membership had expanded to include a significant number of countries, substantially remove, the important cost of exclusion from components trade that has accompanied the shift to preferential trade with their rules of origin in the world as a whole and in East Asia in particular. Developing countries with significant Asia-Pacific trading interests would find membership relatively straightforward.

While the domestic political-economy constraints may postpone US interest in membership for some time, an OTA would not threaten essential US interests, beyond the threat already present in the current proliferation of bilateral FTAs in Asia. There would be some large pluses for the USA. A substantial OTA would be a useful partner of the USA in global and Asia-Pacific trade-liberalization discussions.

There would be economic advantages, as well as gains to external political relationships, if any country chose to extend OTA terms of market access to all its trading partners. To achieve this desirable outcome, countries could even announce a programme for removal of the last of their barriers to imports as part of the formation of OTA.

<sup>13</sup> It is likely that a country which has already made a liberal FTA arrangement already has low external tariffs against trade from all other countries. This would ease the requirement that such a country offer equally liberal access to its markets to all members of any OTA that it was proposing to join. Nevertheless this whole question needs much further investigation.

<sup>14</sup> This possibility is discussed in Spriggs (1991). For further discussion of transparency, see Hoekman (2005) and Bown and Hoekman (2007).

We do not pretend that the genuinely liberalizing dimensions of an OTA would be as easy to implement politically as the protectionist FTAs that have been negotiated recently. The political resistance to such an open FTA might best be challenged by a return to independent, authoritative, and transparent analysis of trade-policy options as a basis for public education and discussion. This is the approach that facilitated trade liberalization in many countries in East Asia in the 1980s and 1990s.

## VI. A second global response: global pressure against trade diversion

A second global response would be to seek to exert global discipline over each and every FTA formed, whether an OTA or not. This idea of seeking to enable the WTO to 'multilateralize regionalism' is discussed in some detail by Baldwin (2006).

A move in this direction was proposed by Frankel *et al.* (1996), who effectively wished to see the WTO require newly created FTAs to adjust their external tariffs in the manner of Kemp and Wan (1976). But these authors foresee a problem. They write:

Some have proposed modifying Article XXIV to require that RTAs reduce barriers against nonmembers. In one proposal, the external tariff should be cut, however much is necessary so that there is no trade diversion. Unfortunately, the degree of liberalization that members of an FTA must grant to outsiders under this criterion may be larger than a typical bloc is politically prepared to grant.

Sinclair and Vines (2006) suggest a way of thinking about this problem which might, possibly, point towards a solution. Here is a sketch of their idea, which has two parts.

First, as we have argued above, open regionalism creates free-rider opportunities for outsiders. Analytically, it lowers tariffs on outsiders to zero, who gain more than participants (at least in the ways in which protectionists view these issues). This free-rider problem, which we have discussed at length above, arises because outsiders get access to the markets of those liberalizing, without these outsiders having to give away access to their own markets. It is clear that there is a tariff rate on outsiders, above zero, which would prevent this ability of outsiders to free ride. Call this tariff rate  $\alpha$ ;  $\alpha > 0$ .

Second, we have also argued above, in a way which is entirely familiar, that FTAs impose negative effects on outsiders, arising from trade diversion. Suppose that those forming a bloc have an initial positive tariff rate of  $t_0$ . Then there exist Kemp–Wan tariffs, at rate  $\beta < t_0$  which would prevent such welfare losses. These tariffs would leave outsiders at least as well off as they would have been had the bloc not been formed.

It is clear that there must be a range of tariffs, at rate  $t$ , within the range  $\alpha < t < \beta$ , which would ensure that two things occurred after the formation of a customs union. First, outsiders would not benefit more than insiders if  $t$  were in the range  $t > \alpha$ . But, second, outsiders would benefit if  $t$  were in the range  $t < \beta$ . One aspiration for those redesigning Article XXIV of the WTO might be to insist that the WTO be enabled to force a choice of external tariff rates on those choosing to form an FTA, whether an OTA or not, so that, in general,  $\alpha < t < \beta$ .

Thinking about the redesign of Article XXIV in this way might, conceivably, help one overcome the problem raised by Frankel *et al.* (1996), cited above.

## **VII. Conclusions**

We have proposed:

- (i) formation of OTA(s);
- (ii) a Trade Transparency Commission in each country participating in an OTA; and
- (iii) global pressure against trade diversion caused by all FTAs (whether OTAs or not).

Within a potential member of an OTA the politics of joining would not be easy, but a Trade Transparency Commission in each country would help. The global supervision of trade diversion would also not be easy to manage, but seems important. It would require, at the least, a WTO which is much stronger as an institution than the WTO is now.

## References

- Baldwin, R. (2006), 'Multilateralising Regionalism: Spaghetti Bowls as Building Blocks on the Path to Global Free Trade', *World Economy*, 1451–518.
- Bergsten, F. (1997), 'Open Regionalism', *World Economy*, 20(5), August.
- (2005a), 'A New Strategy for APEC', paper presented at a meeting of the Pacific Economic Cooperation Council, Seoul, September.
- (2005b), 'Rescuing the Doha Round', *Foreign Affairs*, December.
- (2007a), 'Toward a Free Trade Area of the Asia Pacific', Policy Brief in International Economics No. PB07-2, Petersen Institute for International Economics, February.
- (2007b), 'China and Economic Integration in East Asia', Policy Brief in International Economics No. PB07-3, Petersen Institute for International Economics, February.
- Bown, C., and Hoekman, B. M. (2007), 'Making Trade Agreements Relevant for Poor Countries: Why Dispute Settlement Is Not Enough', *Journal of World Trade*, forthcoming.
- Drysdale, P., House, B., and Vines, D. (1998), 'Europe, East Asia and the APEC Process—A Shared Global Agenda?', ch. 1 in D. Vines and P. Drysdale (eds), *Europe, East Asia and the APEC—A Shared Global Agenda?*, Cambridge, Cambridge University Press, 3–30.
- European Commission (2006), *Global Europe: Competing in the World. A Contribution to the EU's Growth and Jobs Strategy*, cited in Evenett (2007).
- Evenett, S. J. (2007), 'The US Exits, the EU Enters: What Prospects for the Western FTA Initiatives in the Asia-Pacific', University of St Gallen, mimeo.
- Frankel, J., Stein, E., and Wei, S.-J. (1996), 'Regional Trading Arrangements: Natural or Supernatural?', *American Economic Review, Papers and Proceedings*, May, 52–6.
- Garnaut, R. (1996), *Open Regionalism: An Asia Pacific Contribution to the World Trade System*, Singapore, Institute of Southeast Asian Studies, and Sydney, George Allen & Unwin.
- (2005), 'Australia, US and China: Open Regionalism in an Era of Bilateral FTAs', paper presented at a Public Lecture, Asialink, Melbourne, 22 March.
- Gibbs, M., and Wagle, S. (2006), 'The Great Maze: Regional and Bilateral Free Trade Agreements in Asia', Policy Paper, Asia-Pacific Trade and Investment Initiative, UNDP, Colombo, available at <http://www.undprcc.lk/web%20trade/publications/Policy%20Paper%20Book%203.pdf>
- Hoekman, B. (2005), 'Operationalizing the Concept of Policy Space in the WTO: Beyond Special and Differential Treatment', *Journal of International Economic Law*, 8(2), 405–24.
- Vines, D. (2007), 'Multilateral Trade Cooperation: What Next?', *Oxford Review of Economic Policy*, 23(3), 311–34.
- Kanbur, R., and Vines, D. (2000), 'The World Bank and Poverty Reduction: Past, Present and Future', ch. 4 in C. Gilbert and D. Vines (eds), *The World Bank: Structure and Policies*, Cambridge, Cambridge University Press.
- Kemp, M., and Wan, H. (1976), 'An Elementary Proposition Concerning the Formation of Customs Unions', *Journal of International Economics*, 6, 95–7.
- Regional free-trade areas: sorting out the tangled spaghetti 527
- Kissinger, H. (2001), *Does the US Need a Foreign Policy*, New York, Simon & Schuster.
- Krishna, K., and Krueger, A. (1995), 'Implementing Free Trade Areas: Rules of Origin and Hidden Protection', NBER Working Paper No. W4983.
- Krueger, A. (1997), 'Problems with Overlapping Free Trade Areas', in T. Ito and A. Krueger (eds), *Regionalism versus Multilateral Trade Arrangements*, Chicago, IL, University of Chicago Press.
- (1999), 'Are Preferential Trading Agreements Trade Liberalising or Protectionist?', *Journal of Economic Perspectives*, 13(4), 105–24.
- Krugman, P. (1991), 'Is Bilateralism Bad?', in E. Helpman and A. Razin (eds), *International Trade and Trade Policy*, Cambridge, MA, MIT Press.
- (1993), 'Regionalism: Analytical Notes', in J. de Melo and A. Panagariya (eds), *New Dimensions in Regional Integration*, Cambridge, Cambridge University Press.
- Mrazova, M., Vines, D., and Zissimos, B. (2007), 'Is the WTO's Article XXIV Bad', University of Oxford, mimeo.
- Rollo, J. (2007), 'Global Europe: Old Mercantilism in New Bottles', University of Sussex, mimeo.
- Sinclair, P., and Vines, D. (2006), 'Trade Liberalization in Clubs: The Reciprocal Dumping Case', Oxford University, mimeo.
- Spriggs, J. (1991), 'Towards an International Transparency Institution: Australian Style?', *The World Economy*, 14, 165–80.
- Vines, D. (1994), 'Unfinished Business: Australian Protectionism, Australian Trade Liberalisation and APEC', Shann Memorial Lecture, University of Western Australia, Perth, published in the *Australian Economic*

*Review*, **28**(1), and reprinted in P. Compton (ed.) (2005), *Australian Macroeconomic Policy Debates: Contributions from the Shann Memorial Lectures, 1991–2000*, Perth, University of Western Australia Press.

WTO (1997), *Trade Policy Review of the European Union*, Secretariat Report, Geneva, World Trade Organization.

Yi, S.-S. (1996), 'Endogenous Formation of Customs Unions under Imperfect Competition: Open Regionalism is Good', *Journal of International Economics*, **41**(1–2), 153–77.