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Prospects for Closer Economic Relations between Europe and East Asia

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Abstract

East Asia has rapidly become the third centre of gravity for global economic activity. North America is relatively well integrated with East Asia, but Europe is not. This paper explores the extent to which economic growth and trade policy developments over the next decade will strengthen European-East Asian economic integration, and what scope there is to facilitate that set of bilateral relationships. Use is made of a global CGE model (GTAP) to project the world economy to 2005 under various scenarios including Uruguay Round implementation, faster economic growth in China, reneging on the promised phase-out of textile quotas, and APEC trade liberalization. The bilateral trade consequences in those scenarios highlight the fact that as East Asia's relative importance in the world economy keeps growing, so too does its importance to Europe. More surprisingly, the importance of Europe to East Asia also is pro-

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jected to grow with Uruguay Round implementation, and even APEC trade reform does not reduce Europe's projected trade with East Asia. (JEL Classifi - cation: F11, F13, F14, F15, F17)

I. Introduction

Until the 1960s, three-quarters or more of the world's production and trade was generated within Europe or North America. Each of those regions is well integrated economically, and there is considerable integration between them across the North Atlantic. East Asia's rapid growth, however, ensures that by early next century it will be as important economically as Europe and North America, and together these three regions will account for all but one-tenth of the world economy. East Asia has become increasingly integrated intra-regionally, and across the Pacific with North America, but it remains relatively weakly integrated with Europe. Only now is Europe beginning to appreciate the potential for strengthening bilateral relations with East Asia. The recent establishment of the high-level Asia-Europe Meetings (ASEM) process, among other things, is an attempt to begin exploiting this potential.

To help inform that process, the present paper explores empirically both past and prospective trends in that bilateral relationship in the context of ongoing global economic integration. It first examines in Section II the extent to date of intra- and inter-regional economic integration in Europe, East Asia and elsewhere, as reflected in historical trade and investment data, and in particular looks at what that has meant for trade and investment flows between Europe and East Asia. Section III of the paper then analyses the prospects for trade growth between those regions over the next decade. The analysis is conducted in the context of continuing economic growth,

second is the extent to which the Uruguay Round commitments are implemented on time, particularly with respect to the Agreement on Textiles and Clothing. And a third is the challenge of delivering further MFN trade liberalization in the Asia-Pacific region through the APEC process. The effects of each of these prospective developments is analyzed in turn. The final section of the paper draws some conclusions from these empirical findings.

II. International Economic Integration in Europe, Asia and Elsewhere to the mid-1990s

During the past three decades, the economic centers of gravity in the world have changed considerably in terms of their relative importance. Prior to that, Europe and North America dominated the global economy. Since then Europe has continued to contribute about one-third of world GDP and half of global international trade; however, East Asia has nearly trebled its shares of both GDP and trade, the former at the expense of North America and the latter at the expense of other developing and transition economies (Table 1). East Asia now contributes more to global trade than the Americas. If one nets out intra-EU and intra-NAFTA trade from theirs and global trade, then East Asia's importance is even more obvious: by the early 1990s, East Asia's share of global extra-bloc trade exceeded the

Table 1
Relative Importance of Europe, North America and East Asia in Global GDP and Trade (1928 to 1996)

(%)

	GDP			Trade[1)]		
	1928	1963	1995	1928	1963	1996
Europe (including CIS)	38	34	35	52	50	48

whole of Europe's Anderson [1996], Figure 8.1 . When the European Union is treated as a single trading entity (as it often is now by compilers of world trade statistics), it turns out that six of the top nine exporting economies are now East Asian with their combined merchandise exports accounting for almost 30% of the global total; and Malaysia, Thailand and Indonesia are among the next eight World Trade Organization [1997] .

What about the regionalization of international trade and investment flows? For Europe (east and west combined), the intra-regional trade share has been remarkably stable for the 160 years for which data are readily available. The share was two-thirds throughout the nineteenth century, it dropped to three-fifths in the middle half of this century, and has since crept up to around three-quarters. However, for most of that long period the ratio of Europe's trade to GDP has been increasing – so much so that the share of Europe's GDP that is traded with the rest of the world quadrupled during the 100 years to 1930, and it has remained at around one-eighth of GDP since then Anderson and Norheim [1993], World Trade Organization [1996] .

Nonetheless, compared with other regions, both Eastern and Western European trades have been heavily concentrated in their own regions. Western Europe's intra-regional share of total trade has risen steadily from 50 to 70% since the 1950s, and Eastern Europe's jumped from less than 20 to 60% with the formation of the Council for Mutual Economic Assistance (before crashing back to below 20% following the CMEA's demise in the 1990s). By contrast, the intra-regional trade shares have been fairly steady at around a much lower one-third for North America, no more than one-fifth for the rest of the Americas, and until recently around two-fifths (now one-half) for Asia (Table 2).

One would expect Asia's intra-regional trade share to have grown simply because East Asia's share of global trade has grown so dramatically. The

Table 2
Share of Intra-regional Trade in Each Region's Total Trade[1)]
(1928 to 1996)

(%)

	1928	1958	1968	1979	1995
Western Europe	51	53	63	66	69
C. and E. Europe + CIS	19	61	64	54	19
North America	25	32	37	30	36
Latin America	11	17	19	20	21
Asia[2)]	46	41	37	41	51
Africa	10	8	9	6	10
Middle East	5	12	8	6	8

Notes: 1) Total of merchandise exports plus imports.
2) 'Asia' includes Australia and New Zealand plus the Southwest Pacific islands.
Source: Revised and updated from Norheim, Finger and Anderson [1993] using WTO [1997] data.

Western Europe and North America and rose by more than 40% for Eastern Europe/FSU, but it *fell* by 27% for Asia Anderson and Norheim [1993] . That might suggest the intensity of Europe's trade with itself is being reinforced by its regional integration agreements, whereas the absence of substantial inward-looking agreements in East Asia means there is no such influence on Asia's trade pattern.

But what about the share of GDP, as distinct from total trade, that is traded extra-regionally? For Western Europe, North America and Asia that indicator is currently remarkably similar at around 15% in all three regions. North America's share more than doubled over the past two decades because of the rise in its overall trade-to-GDP ratio, while Europe's and Asia's have changed little. However, within Asia, the developing countries have raised substantially their share of GDP traded extra-regionally,

Western Europe fell from 19.3 to 16.4%. Those data imply bilateral export trade growth rates of about 12% pa from Western Europe to Asia (double Western Europe's total export growth rate) and 8% pa growth in the opposite direction over those five years (which was only two-thirds of Asia's overall trade growth rate). By 1995 each region was trading with the other just on one-third of its total extra-regional trade. However, each's share of the other's total trade is only about two-fifths as large as the other's share of global trade. By contrast, the shares of East Asia's and North America's exports with the other is well in excess of the other's share of global trade. This suggests there is considerable room yet for improving trade relations between the Europe and East Asia despite the recent growth in that bilateral trade (Table 3).

Much the same is true of trade between Asia and Central and Eastern Europe plus the former Soviet Union. That bilateral trade has grown much slower than each of those region's total trade. Indeed the latest revised WTO data reported in Table 3 suggest there has been virtually no growth in exports from Asia to those economies in transition over the five years to 1995. The former COMECON economies still trade very intensively among themselves (albeit less than in 1990) and with Western Europe. The share of their exports to Asia is less than half Asia's share of world trade, and the share of Asia's exports to them is only one-third the latter's share of world trade, suggesting even more room for Asian trade growth with these transition economies than with Western Europe.

Global foreign direct investment (FDI) flows have grown much faster than trade flows during the past decade or so, doubling the ratio of FDI to global GDP. But the growth has not been uniform across regions. Outward FDI has grown relatively slowly from the aging economies of Western Europe and Japan during the 1990s, especially compared with North Ameri-

Table 3
Regional Shares in and Growth of Europe's and Asia's Trade[1)]
(1990 to 1995)

(%)

	Western Europe	C. and E. Europe+FSU	North America	Asia[2)]	World
Distribution of Regions' Exports:					
Western Europe					
1990	70.2	3.7	8.0	8.6	100.0
1995	68.9	4.4	7.4	9.6	100.0
C. and E. Europe + CIS					
1990	42.5	38.7	2.1	7.5	100.0
1995	57.3	18.9	4.8	12.8	100.0
North America					
1990	24.1	1.0	34.3	25.6	100.0
1995	19.0	0.8	36.0	27.2	100.0
Asia[2)]					
1990	19.3	1.7	24.4	45.1	100.0
1995	16.4	1.0	23.8	50.9	100.0
Regional Shares of World Trade (X + M):					
1990	*48.8*	*3.3*	*18.4*	*20.3*	*100.0*
1995	*42.7*	*3.1*	*18.7*	*24.7*	*100.0*
Growth in Trade Value (per cent pa, 1990-95):					
Western Europe					
exports	5	9	5	12	6
imports	5	10	5	8	5
C. and E. Europe + CIS					
exports	10	8	25	6	8

Table 4
Annual Flow of Inward and Outward Direct Foreign Investment, Various Regions (1984 to 1995)

(current US$ billions)

	1984-89		1990-94		1995	
	Inward	Outward	Inward	Outward	Inward	Outward
European Union-15	37.7	62.6	78.7	108.2	111.9	132.3
Other Western Europe	2.1	5.3	3.7	8.8	3.7	9.6
C. and E. Europe + CIS	0.0	0.0	3.8	0.2	12.4	0.3
Japan	0.0	20.8	1.6	29.3	0.0	21.3
Hong Kong	1.4	1.8	1.6	10.5	2.1	25.0
China	2.3	0.6	16.1	2.4	37.5	3.5
Other East Asia	6.0	2.7	15.9	7.2	22.7	13.0
North America	48.6	21.5	40.9	47.8	71.4	100.3
Australia/ New Zealand	4.5	3.6	6.7	3.7	15.6	6.7
Rest of World	12.8	2.7	23.7	3.8	37.6	5.8
World	115.4	121.6	192.7	221.9	314.9	317.8

Source: Compiled from United Nations [1996], Annex Tables 1 and 2.

intra-regional) FDI outflows (Table 4).

In the decade to 1995 the importance of FDI in gross fixed capital formation rose by more than a third globally. Little of that change is evident in OECD countries though. By contrast, that indicator for developing Asia rose from 2.6 to 8.2% for inward FDI and from 1.4 to 5.0% for outward FDI, taking it from well below the global average of 3.2% in 1984-89 to well above the global average of 4.0% in 1995 United Nations [1996], Annex Table 5 .

The regional distribution of foreign direct investment stock data in 1992 and their growth since 1980 are reported in Table 5. The European Union-12

Table 5
Regional Shares (and Their Growth Since 1980) in Stocks of Outward and Inward Foreign Direct Investment, EU-12, East Asia, and North America[1)] (1992)

(%)

		EU-12	East Asia	North America	Rest of World	Total
Outward FDI from:	European Union-12	48 (14)	4 (–2)	28 (–5)	18 (–6)	100
	East Asia	16 (7)	24 (–11)	40 (14)	15 (–9)	100
	North America	38 (4)	11 (5)	23 (4)	24 (–4)	100
	[Share of world FDI inward stock]	*40*	*10*	*28*	*22*	*100*
Inward FDI in to:	European Union-12	49 (12)	4 (2)	25 (–15)	20 (–1)	100
	East Asia	14 (–5)	48 (6)	19 (–4)	17 (12)	100
	North America	44 (5)	19 (15)	23 (–18)	12 (–3)	100
	[Share of world FDI outward stock]	*45*	*16*	*30*	*9*	*100*

Notes: 1) Numbers in curved parentheses are the percentage changes in the shares of FDI from 1980 to 1992.

Source: Compiled from Bora [1996] and UNCTAD [1996], Annex Tables 3 and 4.

region's viewpoint: East Asia had by 1992 around 16% of its outward FDI invested in EU-12, and almost the same share (14%) of its inward FDI had

importance of East Asia to the EU.[2] It needs to be kept in mind, however, that small changes in these shares mask huge growth in levels of foreign direct investment: between 1981-83 and 1991-93, the ratio of FDI to GDP grew for OECD countries from 0.9 to 1.6% and for East Asia's developing countries from 0.7 to 1.1% World Bank [1996], Figure 2 .

In short, these merchandise trade and investment data make clear that the world is becoming more integrated not only within regions but also between the major regions, despite the fact that there has been an unprecedented proliferation of regional integration agreements during the past decade, especially in Europe. This conclusion probably would not change greatly if bilateral services trade data had been able to be included. That does not mean those regional agreements are necessarily a good thing for the world economy, however, because even more inter-regional integration and economic growth may have occurred without them. Certainly the data in Tables 3 and 5 suggest there is still very considerable scope for expanding European-East Asian bilateral trade and investment, given the importance of each region in global trade and FDI. That raises a question to be addressed in the next section: to what extent will economic growth and the trade liberalizations in prospect for the next decade alter those bilateral trade flows and shares?

III. Prospective Effects of Global Economic Growth and Trade Reform by 2005

A. The GTAP Model

To provide a picture of how world trade might look in a decade's time, use is made of the latest projections version of the GTAP (Global Trade Analysis Project) computable general equilibrium model located at Purdue Universi

The model utilizes a sophisticated representation of consumer demand which allows for differences in both the price and income responsiveness of demand in different regions depending upon both the level of development of the region and the particular consumption patterns observed in that region. In the simulations presented below, many of the East Asian economies are projected to continue to experience extremely rapid economic growth rates, so that the income elasticities of demand play an important role in the model.

On the supply-side, differences in rates of factor accumulation within and between countries interact with different sectoral factor intensities to drive Rybczynski-type changes in the sectoral composition of output. The GTAP production system distinguishes sectors by their intensities in four primary factors of production: agricultural land, labor time, physical capital, and human capital. Thus in a region where physical and human capital are accumulating rapidly, relative to other factors, we can expect the capital intensive sectors to expand at the expense of unskilled labor-intensive sectors.

The GTAP framework is built on a complete set of economic accounts for 1992 for each of 30 economies/regions spanning the world. It incorporates an exhaustive description of inter-industry linkages at the 37-sector level. In addition to differences in intermediate input intensities, import intensities are also permitted to vary across uses. As well, products are differentiated by place of production. The linkage between the different prices of a product is typically quite strong, but will depend on the degree of substitutability in consumption. In addition to matching up more effectively with reality, this approach has the advantage of permitting us to track bilateral trades, as opposed to simply reporting total exports net of imports.

The standard GTAP parameters used are documented in Hertel [1996, Ch. 4], with two exceptions. First, the income elasticities of demand for

elasticities may still be lower than is reasonable for the long-run changes to be projected below for our ever-more integrated global economy.

Since it is cumbersome to present projections for all 37 sectors and 30 regions in the GTAP data base, for brevity of tabular presentation we have aggregated up to a level which highlights sectors and country groups of interest to this particular study.

The assumed rates of growth in factors and real GDP, from which the implied rates of total factor productivity growth may be derived, are based on combinations of historical data and World Bank projections of the growth in population, labor force, real GDP and investment, as explained in Anderson *et al*. [1997a,b]. Given the substantial differential between the projected growth rates of developed and developing countries, the developing countries – especially East Asia – will constitute a considerably larger share of the global economy in 2005 than currently. Furthermore, given the particularly high rates of savings and investment in East Asia, the capital-labor ratios of these economies are expected to increase, creating supply-side pressures for changes in the composition of output in these economies Krueger [1977]; Leamer [1987] . In particular, the relatively high rates of accumulation of human capital in developing economies are likely to contribute to pressures for structural change as developing countries upgrade the skill-intensity of their product mix. Taking all these things into account and starting with the 1992 baseline, the model generates a projection of the world economy in 2005 assuming no changes to existing trade and other policies. That base scenario is then compared with various alternative scenarios.

B. Effects of Global Economic Growth, Uruguay Round Implementation, and China's WTO Accession on Total Trade and Welfare by 2005

WTO's Integrated Data Base Reincke [1997] , and the agricultural cuts are based on work conducted at the World Bank Hathaway and Ingco [1996] . These modeled offers explicitly exclude protection cuts in China and Taiwan initially (since they are not yet WTO members), and we then consider separately the implications of China and hence Taiwan joining the WTO.

What do we find? Even without China and Taiwan participating, the Round is projected to boost global trade by 10% in aggregate. Trade in all product groups expands, with the biggest gainers being agriculture, textiles and clothing. Prices in international markets rise for most products but fall sharply for textiles and especially clothing. Developing Asian countries enjoy by far the largest trade boost, but even OECD trade is boosted by about one-tenth. Economic welfare is projected to increase virtually everywhere because of the Round, with the gains being especially large for Asia's developing countries thanks to MFA reform. Economic welfare for the world as a whole is greater by $179 billion per year in this scenario Anderson *et al*. [1997b], Table 4a .

Should China and Taiwan be allowed to join the WTO, the Round's impact would be considerably larger, depending on the level of liberalization they commit to in their accession and the date they join. We have conservatively assumed China's commitments would be the same as they offered WTO members in late 1994. Unacceptable as China's offer was at that time, it nonetheless involved very substantial tops-down reductions in protection rates Bach, Martin and Stevens [1996] . Assuming that each tariff is cut only when the tariff binding offered to WTO is below the applied rate, that offer involves a fall in the weighted average rate of protection in China from 30% in 1992 to 16%. This reduction would be complemented by a substantial reduction in the coverage of nontariff barriers. In this paper, we have used the reductions in the trade-weighted bilateral tariffs as documented in Bach

Admission of these two economies to the WTO under these conditions would accentuate the rise in international prices of agricultural products relative to light manufactures, and would boost not only their trade but also the trade of many other countries, adding substantially to world trade growth from the Round (a 14% instead of 10% boost). But the trade boost to other Asian developing countries from the Round would be slightly lessened by China's accession. This is because of the extreme assumption made above, namely, that China and Taiwan enjoy none of the benefits of MFA reform unless they accede to the WTO. That same assumption also affects the welfare results. Globally, the inclusion of China and Taiwan is estimated to boost the welfare gain from the Round by 28%, to $230 billion. In line with the trade effects though, some of East Asia's other developing countries have their estimated gains from the Round slightly reduced when the greater access to OECD markets for textiles has to be shared with a supplier as large as China. Even so, they remain the largest gainers in terms of percentage boosts to national economic welfare. In absolute dollar terms it is Western Europe that is projected to gain the most from the Round Anderson et al. [1997b], Table 4b .

It needs to be kept in mind that these welfare (and probably trade) results are very much lower-bound estimates, for several reasons. One is that the GTAP model used here assumes constant returns to scale and perfect competition in all sectors. Changing that to allow for increasing returns to scale and imperfect competition in some sectors can raise very substantially the estimated impacts of liberalization.[3] Secondly, the version of GTAP used here is not a dynamic model with endogenous growth built in. In so far as liberalization boosts investment (including foreign investment flows), the effects reported here are underestimates of potential gains see McKibbin [1996] . Specifically, with endogenous growth it would be most unlikely that ASEAN

vices trade liberalization see Brown, Deardorff and Stern [1995] , plus the boost they give to investor confidence. If these considerations were included, the projected net national benefits from the Round would be much larger.

C. Effects on the Sectoral Composition of Production and Trade

Table 6 reports the projected changes in the composition of production in the world's economies over the projection period 1992-2005. (ASEAN-4 includes Indonesia, Malaysia, Philippines, and Thailand; NIEs include Hong Kong, Singapore, South Korea, and Taiwan.) Entries in each row refer to the percentage change in the share of each sector in real GDP of each region between 1992 and 2005; the base case E1 assumes no Uruguay Round implementation, case E2 assumes full Uruguay Round implementation by current WTO members, and case E3 assumes additionally that China and Taiwan become WTO members and also participate. From the first column, for example, we see that the base case projection implies a continuation of massive structural change in China over the coming decade (similar in magnitude to that experienced during the past decade or so). The relative volume contribution of agriculture to GDP is projected to decline by 42%, in favor of growth in the GDP shares of manufacturing and services. Similar declines in the relative importance of primary sectors are projected for the other East Asian developing economies. For the more-advanced economies of Western Europe and Japan, the primary sectors are already relatively small but they still decline in relative importance by about one-eighth with the global economic growth assumed over the 13-year period.

The Uruguay Round is projected to add little more to the structural production changes in China, but it accelerates the move away from primary production elsewhere in East Asia (compare the first and second sets of

Table 6
Cumulative Percentage Change in the Composition of Real GDP
(1992 to 2005)
(under different base cases)

		China	ASEAN-4	NIEs	Japan	Aus/NZ	NAFTA	WEurope
Agriculture and Food	E1: Base Case	–42	–21	–36	–11	–6	1	–12
	E2: E1 + UR	–42	–30	–39	–21	–0	6	–15
	E3: E2 + Ch/Ta	–46	–27	–39	–21	–2	7	–15
Other Primary	E1: Base Case	2	–13	–6	1	–6	–3	–6
	E2: E1 + UR	1	–21	2	–2	–5	–2	–7
	E3: E2 + Ch/Ta	–11	–17	2	–2	–5	–2	–7
Light Manufactures	E1: Base Case	5	16	–5	–6	–9	–7	–10
	E2: E1 + UR	8	68	0	–5	–20	–19	–19
	E3: E2 + Ch/Ta	42	42	–0	–6	–23	–21	–21
Other Manufactures	E1: Base Case	63	17	15	1	–4	1	2
	E2: E1 + UR	60	–12	9	2	–8	2	4
	E3: E2 + Ch/Ta	38	–4	9	2	–8	2	4
Services	E1: Base Case	15	6	1	1	2	0	1
	E2: E1 + UR	14	–0	–0	0	2	0	2
	E3: E2 + Ch/Ta	9	1	–0	0	2	1	2

Source: Anderson *et al.* [1997b], Table 5.

Allowing China and Taiwan to join the WTO and thereby share greater access to OECD markets, especially for textiles and clothing, in return for liberalizing their own trade regimes, would result in an even faster relative decline for China's primary sectors (see the third set of rows in Table 6). It would also ensure that resources released from agriculture to the non-primary sectors are concentrated more in light manufactures, where labor-abun-

Table 7
Change in Trade Balance Resulting from Economic Growth, the Uruguay Round and China/Taiwan's WTO Accession, by Commodity and by Region (1992 to 2005)

($US 1992 billion)

	China	ASEAN-4	NIEs	Japan	Aus/NZ	NAFTA	WEurope
Agriculture and food	–13.3	–4.8	–8.4	–12.3	3.1	23.7	–7.2
Other Primary	–10.9	10.4	16.8	–13.4	1.9	3.8	–6.8
Light Manufactures	58.6	40.9	27.7	2.9	–3.8	–70.2	–80.3
Other Manufactures	–32.9	–37.5	–33.2	17.0	–3.1	15.3	44.1
Services	–1.5	–9.0	–2.9	5.9	1.9	27.4	50.2
Total[1)]	0	0	0	0	0	0	0

Notes: 1) Total trade balance is fixed by assumption in this simulation.
Source: Anderson *et al.* [1997b], Table 6.

tures would be almost $60 billion greater (in 1992 constant dollars) in 2005 than in 1992, whereas China's net imports of primary products and other manufactures would be $24 billion and $33 billion greater, respectively. Similar changes occur for ASEAN-4 and the NIEs. (We have held each country's trade balance constant in these projections, which is why the column sums are all zero.) Japan and Western Europe increase their net imports of primary products while Australia and North America do the opposite thanks to the agricultural reforms of the Round. For all the OECD country groups except Japan, net imports of light manufactures rise and their big gainers are net exporters of other manufactures and services. Services export growth is especially large for North America and Western Europe. All these changes are what one would expect from the theory of changing comparative advantage and from past Asian growth experience, and together with –

2005. Here the focus is just on West European-East Asian bilateral trade. Not surprisingly, given the assumed high rates of growth of East Asia's developing economies and their trade boost from the Round, they are the countries enjoying the largest increases in Western Europe's extra-regional trade shares. Even without the Round their share of Western Europe's extra-regional exports is estimated to rise from 15 to 21% between 1992 and 2005, and their import shares from 17 to 23%. With the Round (and China/ Taiwan accession to WTO) those shares rise to 24% for exports and 28% for imports. In proportional terms, it is China's trade shares that rise most (more than doubling), followed by ASEAN's. By contrast, Western Europe's extra-

Table 8
Impact of Economic Growth, Uruguay Round Implementation and China/Taiwan WTO Accession on East Asian and APEC Shares of Western Europe's Extra-regional Trade[1)] (1992 to 2005)

(%)

		China	ASEAN-4	NIEs	Japan	East Asia, Total	NAFTA
Western Europe's Extra-Regional Export Shares	1992	2.9	5.2	7.0	7.5	22.6	28.8
	2005 without UR	4.6	7.8	8.4	6.3	27.1	26.1
	2005 (with UR including China/Ta)	6.4	8.4	9.0	6.4	30.2	26.5
Western Europe's Extra-Regional Import Shares	1992	3.7	4.8	8.5	13.4	30.4	30.0
	2005 without UR	5.5	7.5	10.2	10.2	33.4	26.8
	2005 (with UR including China/Ta)	9.0	10.2	9.2	9.2	37.6	25.9
Exports	1992-2005 without UR	60	49	20	–16	20	–9
Exports	1992-2005 (with UR						

regional trade shares with Japan are projected to fall moderately by 2005. Nonetheless, East Asia in total shifts from being less important than North America in 1992 to being much more important by 2005 in Western Europe's extra-regional trade: averaging exports and imports, East Asia's share rises from 27 to 34% while NAFTA's share falls from 29 to 26% (Table 8).

By contrast, Western Europe's shares of East Asia's exports are projected to continue declining as the relative importance of the East Asian region in world trade grows. For example, the NIE's export share to Western Europe drops 3% points between 1992 and 2005 if the Round is not implemented, while China's and Japan's drops almost 4% points. However, it rebounds for China and the ASEAN-4 (though not for Japan and the NIEs) if the Uruguay Round is implemented, largely due to textiles and apparel reforms. On the import side, the story is much the same: economic growth without the Round would see Western Europe's share of East Asia's imports fall, but the Round is projected to reduce that drop. Meanwhile, the intra-regional trade shares for East Asia are projected to increase over this period – mostly as a consequence of rapid growth in the region. When that intra-regional trade is netted out, Western Europe's shares of East Asia's extra-regional trade, which were about one-third in 1992, are projected to rise a couple of percentage points by 2005 once the Round is implemented (Table 9).

E. Effects of Altering Some Assumptions and of Further Trade Reform in APEC

The projections presented above depend on myriad assumptions, some of which may have a significant effect on the results. Two in particular are worth scrutinizing. The first is the rate of economic growth assumed for China; the second is the full implementation of the commitment to reform

Table 9
Impact of Economic Growth, Uruguay Round Implementation and China/Taiwan WTO Accession on East Asian and West European Shares of East Asia's Trade (1992 to 2005)

(%)

		Share of Exports to:		Share of Imports from:	
		East Asia	Western Europe	East Asia	Western Europe
China	1992	40.2	23.0	52.9	19.8
	2005 without UR	43.8	19.4	53.1	17.7
	2005 (with UR incl. Ch/Ta)	37.9	23.7	57.1	18.4
ASEAN-4	1992	47.2	21.9	48.7	25.6
	2005 without UR	48.0	20.6	54.1	22.1
	2005 (with UR incl. Ch/Ta)	38.9	27.0	53.8	22.7
NIEs	1992	42.4	18.5	51.6	14.4
	2005 without UR	49.5	15.5	54.8	12.6
	2005 (with UR incl. Ch/Ta)	55.5	14.0	53.3	13.5
Japan	1992	31.9	22.5	28.6	16.5
	2005 without UR	41.9	18.7	37.1	13.6
	2005 (with UR incl. Ch/Ta)	47.0	17.3	41.5	13.8
East Asia, Total	1992	40.1	20.8	42.9	17.8
	2005 without UR	46.0	18.0	49.6	13.2
	2005 (with UR incl. Ch/Ta)	46.5	19.3	50.0	16.3

Source: Authors' model results.

this is lower than the rate which has been sustained during the past two decades, it is of interest to see what difference it makes if the higher historical growth rates are assumed to continue. This is done by re-running the simulation with the Round being implemented and China and Taiwan join-

Faster Chinese industrialization means more inter-sectoral adjustment away from primary production and a non-trivial increase in international prices for and trade in primary products. China's trade would be 29% higher and global trade would rise by more than 2%, with ASEAN-4 being the only region shown to suffer a decline in trade volume (because of increased competition in exports of light manufactures from China). There is a considerable increase in each region's exports to and imports from China, and only a partial offset in terms of Europe's decreased trade with other East Asian economies. For example, Western Europe's exports to China would be higher by $13.5 billion per year in 2005, and its imports higher by $23 billion, if China's economic growth rate was one-sixth faster over the period. Western Europe's trade with other East Asian economies would diminish somewhat however, so its net trade expansion with East Asia would be somewhat smaller (Table 10).

2) Trade Effects of Incomplete Reform of the MFA

Elimination of the bilateral quotas associated with the MFA under the Uruguay Round is designed to occur gradually. The first step under the Agreement on Textiles and Clothing during the ten-year transition period to 2005 involves increases in the growth rates of MFA quotas, followed by a progressive integration of textile and clothing items into the WTO system, after which the quotas are abolished altogether. The tariff lines to be integrated under GATT are selected by the importing countries, and it appears that few commodities subject to binding quotas will be integrated until near the end of the transition period (2005). Therefore the real liberalization of trade in these products is heavily loaded towards the end of the period.

Based on earlier analysis Hertel *et al.* [1996] , it appears that the degree of quota acceleration committed to under the Agreement on Textiles and

Table 10
Impact of Alternative Scenarios on Bilateral Trade Volumes in 2005

($US billion at constant 1992 prices)

Change in exports from: \ to:		China	ASEAN-4	NIEs	Japan	NAFTA	All East Asia	WEurope	World
China	China Grows	0.0	6.9	32.4	12.0	27.8	68.3	22.9	122.0
	MFA Snapback	0.0	0.2	5.0	2.5	–15.3	–7.6	–15.8	–18.0
	APEC Reform	0.0	5.4	11.2	18.9	15.2	47.9	8.8	69.4
ASEAN-4	China Grows	4.9	–0.0	–2.9	–0.5	–2.4	–0.9	–3.0	–3.9
	MFA Snapback	1.3	1.6	7.5	6.9	–17.4	–0.1	–28.0	–20.6
	APEC Reform	5.3	6.6	7.5	6.7	9.2	35.3	8.1	50.3
NIEs	China Grows	22.8	–4.0	–4.5	–2.5	–3.8	8.0	–2.8	3.0
	MFA Snapback	–5.5	–10.6	–0.5	–0.1	8.2	–8.5	5.4	–1.4
	APEC Reform	31.5	15.6	–0.4	9.6	–2.0	54.3	–5.1	45.2
Japan	China Grows	12.3	–1.9	–5.1	0.0	–1.7	3.6	–0.9	2.2
	MFA Snapback	–1.9	–1.9	–1.4	0.0	2.6	–2.6	2.0	–0.1
	APEC Reform	15.6	4.9	–8.0	0.0	78.9	91.4	–15.5	67.0
All East Asia	China Grows	40.0	1.0	19.9	9.0	19.9	79.0	16.2	123.3
	MFA Snapback	–6.1	–10.7	10.6	9.3	–21.9	–18.8	–36.4	–40.1
	APEC Reform	52.4	32.5	10.3	35.2	101.3	228.9	–3.7	231.9
WEurope	China Grows	13.5	–2.1	–4.2	–1.1	–3.0	3.1	–4.4	–5.5
	MFA Snapback	–3.4	–4.7	–3.9	–2.3	–1.8	–16.1	–0.7	–24.7
	APEC Reform	17.8	8.5	10.0	3.5	15.1	54.9	–7.6	34.9

Source: Authors' model results.

37 of the 44 bilateral flows examined. Given that finding, our MFA snapback scenario may be more modest than the true consequences of failing to abolish these quotas in 2005.

Such a snapback would raise the international price of light manufactures and reduce global trade in these products by 11% (and global trade in farm products by 2% because of reduced agricultural imports by East Asia). This shrinks total trade of most regions but especially exports from China and ASEAN-4 to Western Europe and North America. Those regions' reductions in imports are necessarily matched by a fall in their exports, especially to the East Asian developing economies that would be selling less textile exports and hence less able to afford imports. In this scenario, by 2005 Western Europe not only reduces its imports from East Asia by $36 billion but also exports $16 billion less to East Asia each year (Table 10).

3) Trade Effects of Additional APEC MFN Liberalization

APEC Heads of Governments agreed in November 1994 at Bogor to eliminate, on an MFN basis, all trade barriers in the APEC region by 2010 in the case of advanced economies and by 2020 in the case of developing countries. The agreement was reaffirmed at the subsequent summits in Osaka and Subic Bay, and Action Plans have since been tabled. If that reform were to be smoothly phased in, then by 2005 advanced countries would be two-thirds reformed and developing countries two-fifths there. Assuming a delayed start by the former, one might expect the region on average to be half way along by 2005. To examine the effects of such a scenario, consider the impact of a further halving of the barriers to merchandise trade that would otherwise have remained in APEC countries in 2005 after the Uruguay Round's implementation.

Under this APEC liberalization scenario, global trade would be boosted by

and cultural affinities, ensure that most of the benefits from market opening go to other countries of the region even without the liberalization being preferential. Even so, one of the great virtues of the proposal to liberalize on an MFN basis is that the APEC reforms also would boost extra-regional trade. For example, Western Europe's export volume to East Asia would be about $55 billion greater under a 50% APEC liberalization (Table 10).

IV. Conclusions

The paper began by stressing several developments likely to affect total and bilateral trade prospects, including between Europe and East Asia over the next decade. One is the accession to the WTO of China and hence Taiwan. Another is the extent to which the East Asian economies, and especially China, continue their rapid growth through export-oriented industrialization. A third is the extent to which the Uruguay Round commitments are implemented on time, particularly with respect to the Agreement on Textiles and Clothing. And a fourth is the challenge of delivering further MFN trade liberalization in the Asia-Pacific region through the APEC process.

Each of these concerns has been addressed in the empirical simulations reported above, all in the context of on-going global economic growth and Uruguay Round implementation. The results suggest WTO accession for China (thereby extending substantially the country coverage of MFA reform) would boost the welfare gains from the Uruguay Round by nearly 30%. Of course, this would further increase the pressure for structural adjustment away from producing light manufactures in OECD countries. Since that pressure would be concentrated in the clothing sub-sector, Western Europe and North America may try to use that as an excuse for not fully implementing their promised reform of the MFA by 2005 – the costs of

ly the economies of East Asia would certainly grow faster than assumed here, for example.

Bilateral trade between Western Europe and East Asia is projected to increase substantially thanks to both economic growth and the Uruguay Round. Even without the Round, Table 8 suggests that the shares of Western Europe's extra-regional exports to and imports from East Asia would increase three or four percentage points between 1992 and 2005. The Round's implementation would add a further three or four points, suggesting that by 2005 those shares can be expected to be between one-quarter and one-third larger than in 1992. By contrast, North America's share of Western Europe's trade is projected to fall such that East Asia becomes significantly more important than NAFTA to Western European trade by 2005. Table 9, on the other hand, suggests that East Asia's trade will become relatively more intra-regional. However, the Round will prevent the decline in Western Europe's share of East Asia's trade from being significant. The importance of each region in the other's extra-regional trade is projected to grow much faster for Europe than for East Asia, so that by 2005 those shares will have converged, to about one-third. The results make clear that critical to the development of trade between East Asia and Western Europe are the implementation of the Uruguay Round agreements, especially the phase-out of the Multifibre Arrangement, and the accession of China and Taiwan to the World Trade Organization. More surprisingly, the results show that MFN liberalization in just the APEC region also contributes to export trade growth and welfare improvements for Western Europe – and presumably would have also shown continued rapid growth in outward FDI to East Asia, had we been able to explicitly model bilateral FDI flows. Given the current low degree of European-East Asian integration though, as reflected in Tables 3 and 5, there will be ample room over the next few years

sive manufactures. The negative effect on real incomes in Asia and the Pacific is estimated in one recent study to amount to less than 0.2% of the region's GDP, however, depending on the extent to which sensitive products from Eastern Europe (food, textiles, clothing, steel) are allowed free access to EU markets Baldwin and Francois [1996] .

Finally, other possible policy developments that would influence European-East Asian trade include the formation of a Trans-Atlantic Free Trade Area (TAFTA) between Western Europe and North America, and a new multilateral trade negotiation under WTO auspices early next decade. Trade liberalization under a TAFTA is likely to have relatively little effect, since remaining tariffs on North Atlantic trade on most products are trivial. According to a recent study, it would reduce real incomes in Asia and the Pacific by about $9 billion per year if the agreement was preferential, or raise them by $56 billion if it was an MFN non-preferential agreement. The latter gain is, however, dwarfed by the study's estimated potential gains from a new global round of multilateral trade negotiations. If such a round involved a 50% cut in tariff equivalents (along with some other trade facilitation including a deepening of the WTO's Government Procurement Agreement), it could boost annual real incomes by $265 billion in Asia and the Pacific, by $107 billion in Western Europe, by $83 billion in NAFTA, and by $197 billion in the rest of the world Baldwin and Francois [1997] . These results suggest Western Europe should forget about pursuing a preferential TAFTA and instead welcome the APEC MFN liberalization initiative as a stepping stone towards the launching of another multilateral round of trade negotiations by the turn of the century.

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