South-South Economic Cooperation: Emerging Trends and Future Challenges

BACKGROUND RESEARCH PAPER

Manmohan Agarwal

Submitted to the
High Level Panel on the Post-2015
Development Agenda

This paper reflects the views of the author and does not represent the views of the Panel.

It is provided as background research for the HLP Report, one of many inputs to the process.

May 2013

South-South Economic Cooperation: Emerging Trends and Future Challenges*

Manmohan Agarwal

I wish to thank Jiajun Xu for many valuable suggestions and comments and to the participants of a conference on Southern Providers of Development Cooperation; South-South Cooperation, Issues and Challenges, held at the Research and Information Systems, New Delhi, 15-16 April, 2013 for many helpful comments on an earlier draft. The usual disclaimers apply. The author is also grateful for the date support from Division on Investment & Enterprise, UNCTAD.

Executive Summary

Economic performance of developing countries, which had improved substantially in the years before the financial crisis of 2008 as compared to their performance in the 1980s and 1990s, has suffered a setback because of the crisis, though it is still better than in the 1980s and 1990s. Part of the reason for this improved performance was increased integration into the international economy as this allowed countries to take advantage of their comparative advantage to increase exports of goods in which they had a comparative advantage and to benefit from cheaper production abroad through imports. Developing countries have increased their share of world exports of goods and services (XGS), particularly of goods, inward and outward flows of foreign direct investment (FDI), and technology exchanges as their capacity to develop their own technologies has grown. Since the financial crisis, increase in the share of XGS in GDP has stalled, it fell for half of the large developing economies who are members of the G20 while increasing for the other half. But developing country regions and the major emerging economies by and large continued to increase their share of world merchandise exports.

Exchanges among Southern countries have played a prominent role in this integration into the world economy. South-South trade (SST) in goods has increased phenomenally. Southern exports to other countries of the South now account for more than 50 percent of the exports of most developing regions and also for most large developing economies. While such exports remain concentrated within regions as intra-regional exports are much greater than inter-regional exports, there has been significant diversification as the share of intra regional exports has declined in all regions. Most regions have increased their exports to Asia the fastest.

Southern countries have been less successful in increasing exports of services. Low income countries, as defined by the World Bank, have seen an increase in the share of service exports in GDP, which is now approaching that in the high income countries. But after increasing till 2005 the share declined in the middle income countries so that it is now at the same level as in 1995. Among the regions, South Asia shows a consistent increase while for the other regions there has been a decline after an initial increase so the share is almost at the same level as it was initially in 1990.The performance of the large emerging economies is also not very good. In 7 of the 11 the share has fallen after the financial crisis and in 4 it is even lower than in the period 1990-2000. As far as the share of service exports in total world exports of services, it fell after the crisis in 8 of the 11 countries, and in 2 was even lower than in the period 1990-2000, while for 4 it was the same. Developing countries with some exceptions have not been as successful in increasing their share of world exports of the dynamic financial and IT related services, though the share of such exports in GDP increased in the middle income countries while it was relatively constant for the low income countries.

FDI flows both outward from developing countries and inward to developing countries have increased as a share of GDP. The share of developing countries has increased for inflows to almost 50 percent, mostly from East Asia. Developing countries account for a much smaller though rising portion of outflows, over 21 percent in 2011, mostly from East Asia. LAC is the second most important region for both inflows and outflows. The services sector predominates in receiving capital from developing countries. But while commercial banks in many developing countries are large, they have only a limited presence in other developing countries.

Technology cooperation is being increased particularly in the areas of agriculture and pharmaceuticals and medical equipment. There is also increasing flow of technologies better

suited for the needs of developing countries, what has come to be known as ‘frugal technology’. Part of technology transfer takes place through trade in capital goods.

Foreign exchange reserves held by developing countries have been increasing. There is talk of pooling the use of these reserves as developing countries are unhappy with the conditionality imposed by the IMF for having access to the IMF’s resources. But developing countries have not yet been able to make much headway in their desire for such pooling. East Asian countries are the furthest along through their Chiang Mai Initiative Multilateralized. But the rules are such that the funds were not used in the 2008 crisis. Developing countries have not yet been able to reform the governance structure of the IMF or the World Bank, though agreement has been reached in principle.

SSEC can be developed in the areas of trade, technology, FDI so that the beneficial effects are multiplied. There is considerable scope for improved SSEC in these areas. Tariffs on imports from developing countries are high and provide scope for differential preferences for imports from developing countries. FDI from developing countries could be encouraged by preferential tax arrangements. Similarly, commercial links could be developed by having weaker requirements of entry for banks from developing countries than for banks from developed countries. Also common regulatory practices could be developed, particularly on a regional basis. Such harmonization would encourage banks to set up branches in other countries. There is considerable scope for cooperation in the areas of research, technology development and student exchanges.

Research is needed on how best SSEC in the areas of trade, commercial relations including FDI, and technological development can be enhanced. Research is also needed of how the weakness of

financial relations where sudden withdrawal of loans or funds can subject a country to a serious macroeconomic crisis can be avoided in the context of SSEC. The issue of how to pool resources including reserves is still almost completely unsettled and research can resolve some of the important issues. In particular, an important question is how effective is the practice of developing countries to avoid conditionality in their dealings with other developing countries and how the effectiveness of such dealings can be improved.

Research is also needed on how best to improve the effectiveness of the current institutions of international economic governance. The general view is their effectiveness is being limited by developing countries not having sufficient voice in their governance and the lack of partnership between the developed and developing countries. There is also need to examine how and what institutions can help push SSEC ahead paying full heed for the need for these institutions to be legitimate and effective.

Chapter I Historical Background: Origin and Principles of South-South Economic Cooperation

South-South Economic Cooperation (SSEC) is any action or policy by a developing country that privileges economic transactions with one or more developing country.[1] Effective SSEC requires that such policies encompass a significant portion of transactions whether in the field of trade, investment or financial flows.[2] SSEC could also cover cooperation between developing countries to bring about changes in international economic governance, whether through coordinated action at the G20 or UN level or in specific organizations such as the World Bank or in standard setting bodies such as the International Organization of Securities Commissions.

Developing countries have enunciated their desire for greater cooperation since the Bandung conference in 1955 as they sought to promote economic and cultural cooperation "on the basis of mutual interest and respect". This objective was repeatedly asserted by the non-aligned movement. The fundamental principles governing SSEC are respect for national sovereignty, national ownership and independence, equality, non-conditionality, non-interference and mutual benefit.

The push for South-South Trade (SST) gained momentum in the 1960s. High costs of production resulted from the small scale plants established under the import substitution industrialization (ISI) strategy adopted by most developing countries in the 1950s and 1960s. The high costs meant these goods could not compete in world markets. The resulting stagnant exports combined

[1] Examples of privilege would be when imports from developing countries into another development country face a lower import duty than similar goods from a developed country or rules of entry for banks are less stringent for banks from developing countries than from developed countries.

[2] If only a limited set of transactions are covered then they would have neither a significant effect on the direction of world transactions or on the development of developing countries. It is similar to the condition under the article of the WTO agreement that accepts customs unions if they cover a substantial amount of trade among the partners.

with rising imports of intermediate goods for the new industries and of capital goods for investment resulted in balance of payments deficits that often put a brake on growth. Preferential trading arrangements (PTAs) were recommended by experts such as Prebisch to allow for specialization and establishment of plants that benefitted from economies of scale. Many PTAs were established, e.g. Latin American Free Trade Agreement, The Central American Common Market, The Andean Pact, The East African Community between Kenya, Uganda and Tanzania. However, the less industrialized members feared that most of the benefits would accrue to the more developed members of the PTA and the failure to devise schemes that would result in a more appropriate distribution of benefits between the more and the less developed countries in the PTA resulted in very limited progress in implementing PTAs (Agarwal, South-South Trade : Building Block or Bargaining Chip in J.Whalley (ed.) Rules, Power and Credibility, Macmillan 1991).

Chapter II Emerging Trends: A Conceptual Map of Multi-Dimension SSEC

Section II-a Scope for SSEC

In current circumstances, SSEC has to encompass more than merely trade. The production process has been splintering in that an entire product starting from the preliminary stages is no longer produced in one country. Different parts are produced in different countries and then assembled. Some entity has to coordinate the entire process to ensure that decisions are taken in a timely manner and that the parts are compatible. This coordination function is usually performed by transnational companies (TNCs). Very often the splintering of the production process is accompanied by the TNC establishing companies to produce the parts providing both capital and or technology. When a TNC first starts operations, it often encourages its suppliers in its home market to also establish operations in the host country. A larger proportion of the final price of the product accrues to the persons or entities that provide the design, technology and marketing functions than to the persons who provide the labour. As companies in developing countries have matured they have become TNCs and not merely a step in the production process governed by others. As a result, South-South transactions have spread from trade to outward flows of foreign direct investment (FDI) and to transfer of technologies that they themselves have produced creating scope for cooperation in these areas. The scope for cooperation in the area of science and technology has increased considerably as more and more developing countries are able to create technologies. Also many large commercial banks have arisen in developing countries. This creates the opportunity for financial collaboration through establishment of more branches of developing country banks in other developing countries so that the savings of developing countries can be more optimally allocated across developing countries. In a parallel manner currently many developing countries have large foreign exchange reserves and the issue is

whether these reserves can be beneficially pooled so that more of the savings can be invested rather than hoarded. SSEC can cover trade, finance (e.g., loans from national development banks, financial market development), investment (FDI), technology etc.

This multi-dimensionality increases the gains from SSEC, as discussed below, and could lead to more countries benefiting from SSEC and so a better distribution of the gains from cooperation.[3] SSEC can be further developed by appropriate policy actions. Furthermore, there are already a number of institutional developments that foster SSEC and these can be built on to accelerate development of SSEC. In particular, schemes can be built on to ensure that less developed countries benefit from SSEC.

Conditions are conducive to make SSEC a success whether that is measured in terms of achieving the liberalization attempted in the agreements or in terms of increased SSEC or even in terms of whether SSEC has resulted in better outcomes through faster growth or faster technology development or better social outcomes. i.e. faster poverty reduction or falling mortality rates.

In earlier years links of developing countries were mainly with developed countries so that SSEC was less than optimal. Policies to foster SSEC can correct this imbalance. But SSEC should not be seen as a substitute for North-South cooperation which has its own benefits. Furthermore, growth in the developed countries is expected to remain low in the medium term and SSEC can contribute to maintaining high rates of growth among developing countries. Also, SSEC is not meant to be altruistic; it is expected to benefit all participants. The lesser asymmetries of power

[3] One of the reasons that attempts to form preferential trading areas in the 1960s and 1970s failed was the fear on the part of the less industrialized countries that most of the benefits would go to the more industrialized countries. See (Agarwal, 1991) for an analysis of these attempts. Similarly there would be fears currently that a few countries such as China, India, Brazil and South Africa, may be the major beneficiaries of any preferential agreement in manufacturing trade. The more sectors that are covered by SSEC the greater the probability that a country would have a comparative advantage in some area and so would benefit. This would be particularly the case if technology is included as there are so many facets to technology and so many different kinds of technology that it is likely that a country may have a comparative advantage in some aspect of technology.

among developing countries and accountability that could be encouraged because of meetings of developing countries including those of the G77 could ensure a more even distribution of the benefits from SSEC.[4] We argue that SSEC should be developed through a process similar to that of open regionalism. Countries would be free to join if they meet certain conditions. Countries would only join if they believed they would gain. Furthermore, if some adjustments could improve their prospects they could propose these and the other countries may agree.

The fear of asymmetric benefits can be seen in the criticism that has sometimes been voiced that Chinese exports have lead to de-industrialization in SSA. But it is difficult to substantiate that hypothesis (Table 1). There are also fears that these countries could be stuck at the bottom of global value chains (GVCs). These are discussed below.

[4] As yet the G77 has not been called upon to play such a role and it is unclear whether it could play such a role. If it is not able to play such a role then another body might be required.

Table 1 Manufacturing Value Added and Exports by Region

	1990-2000	2001-07	2008-10	Col3/Col1 %
East Asia and Pacific				
Manufacturing Value-added (% of GDP)	30.43	31.05	30.1	98.9
Manufacturing Value-added (Annual % growth rate)	10.39	10.21	7.67	73.8
Manufacturing Exports (% 0f GDP)	19.78	28.84	23.79	120.3
Latin America & Caribbean				
Manufacturing Value-added (% of GDP)	19.52	18.18	17.03	87.2
Manufacturing Value-added (Annual % growth rate)	2.52	3.07	1.21	48.0
Manufacturing Exports (% 0f GDP)	6.99	11.38	9.25	132.3
Middle East & North Africa				
Manufacturing Value-added (% of GDP)	14.21	12.09		
Manufacturing Value-added (Annual % growth rate)	4.96	5.88	3.82	77.0
Manufacturing Exports (% 0f GDP)	3.82	5.22	7.54	197.4
South Asia				
Manufacturing Value-added (% of GDP)	15.68	15.64	15.54	99.1
Manufacturing Value-added (Annual % growth rate)	5.85	8.19	6.46	110.4
Manufacturing Exports (% 0f GDP)	6.96	9.03	9.03	129.7
Sub-Saharan Africa				
Manufacturing Value-added (% of GDP)	15.9	13.71	12.9	81.1
Manufacturing Value-added (Annual % growth rate)	1.59	3.7	0.65	40.9
Manufacturing Exports (% 0f GDP)	6.86	9.34	9.17	133.7

Source: World Bank Development Indicators

The trends in the different regions are somewhat similar.

1. Manufacturing value added as % of GDP declines steadily in all regions except East Asia.

But for China, the share of manufacturing in GDP has declined quite sharply from 40 percent in 1979 to 30 percent in 2010.

2. The growth rate of VA in manufacturing usually, except E Asia, is higher in the second period and lower in the third period. These two trends of declining share of manufactures in GDP and a fall in the growth rate of value-added in manufacturing though common to all the regions are the sharpest in SSA. But as noted below in point 3 this may be more because of domestic factors rather than exports.

3. Manufacturing exports as a percent of GDP rose in the second period and fell in the third period for many of the regions. Actually the growth in the average of manufacturing exports as percent of GDP between 2008-10 as compared to 1990-2000 is higher in SSA than in the other regions suggesting that domestic factors may be more important in the behavior of the sector.

It is difficult to substantiate the hypothesis of Chinese exports leading to de-industrialization in SSA.[5]

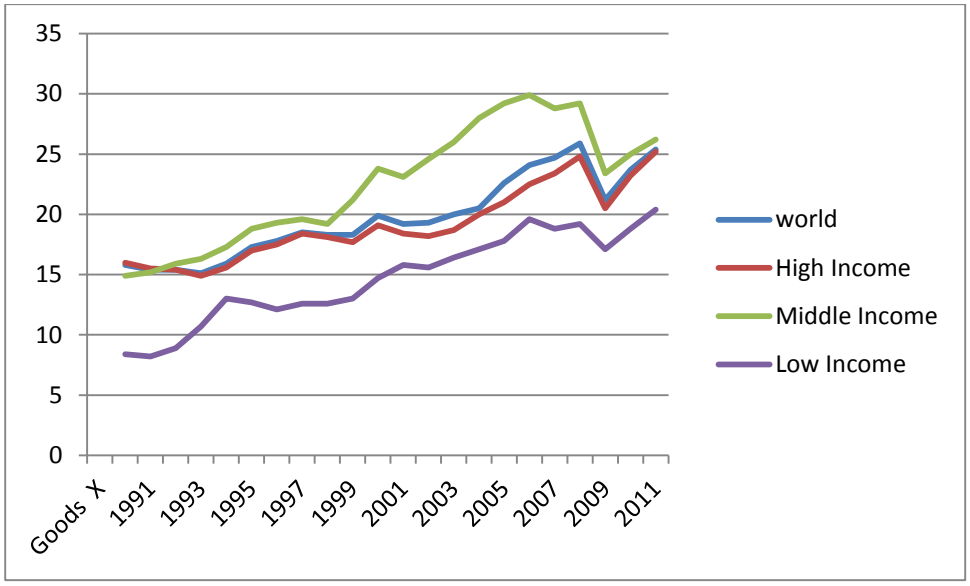
Section II-b The Scale of SSEC

Section II-b-1 Trade in Goods

The share of exports of goods in GDP has increased for all regions. After a dip after the 2008 financial crisis, the upward trend in share of exports in GDP has resumed, except in East Asia. The importance of exports in GDP has been higher in the middle income countries than in the high income countries since the early 1990s. The share of exports in GDP in the low income countries has increased from about a half of that in the high income countries in the early 1990s, to 80 percent recently (Figure 1).

[5] Of course a proper analysis would require examining the import in total availability of major industrial sectors as import competition could have hurt the sector.

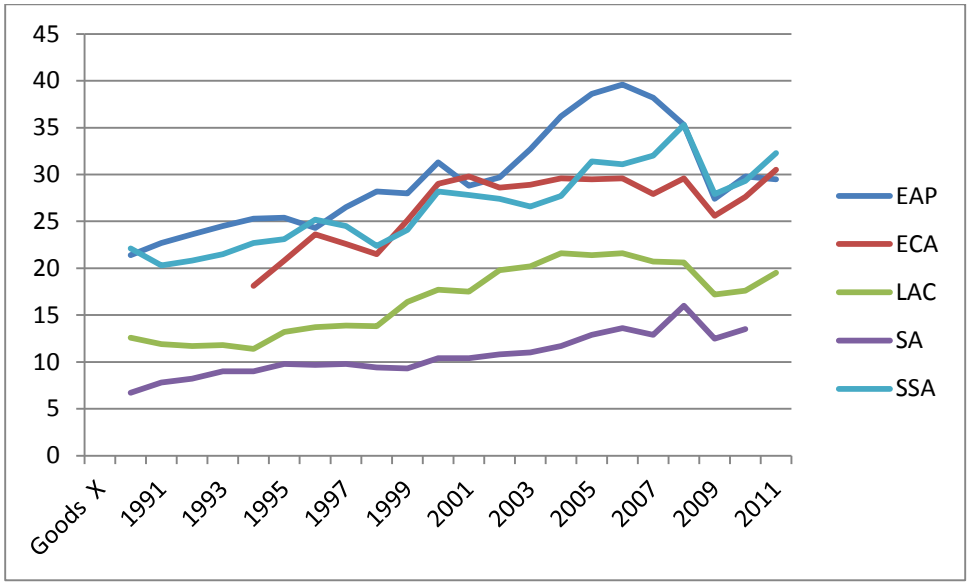
Figure 1 Share of Exports of Goods in GDP (percent)



Source: World Bank Development Indicators

The share of exports in GDP has increased substantially in all the developing country regions (Figure 2). This is also true for the larger developing countries. However, there has been a large fall in this share in East Asia since the crisis. In the other regions the share also fell immediately after the crisis but then recovered to the level before the crisis.

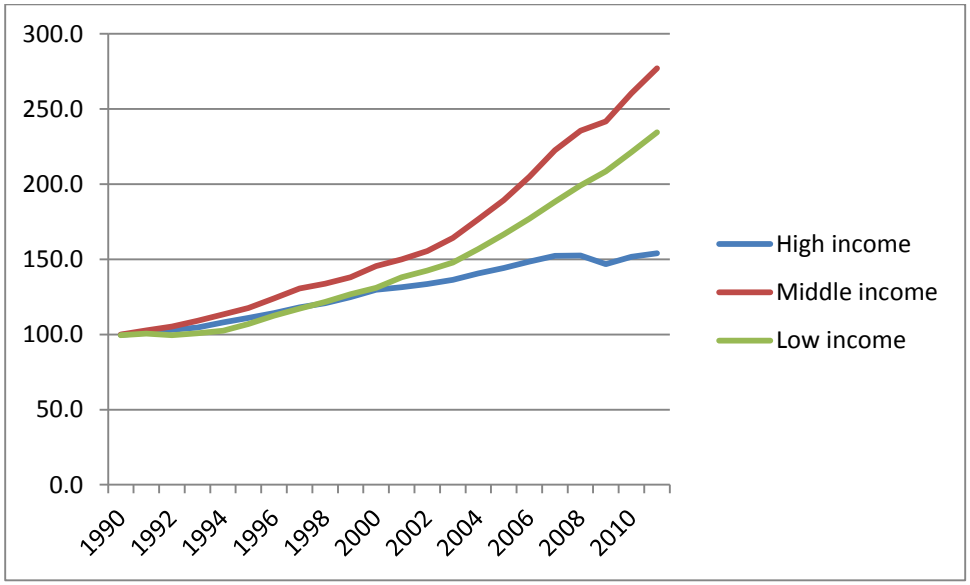
Figure 2 Share of exports of Goods in GDP, Developing Country Regions



Source: World Bank Development Indicators

The changes in the share of exports in GDP can be compared to the growth of GDP (Figures 3 and 4).

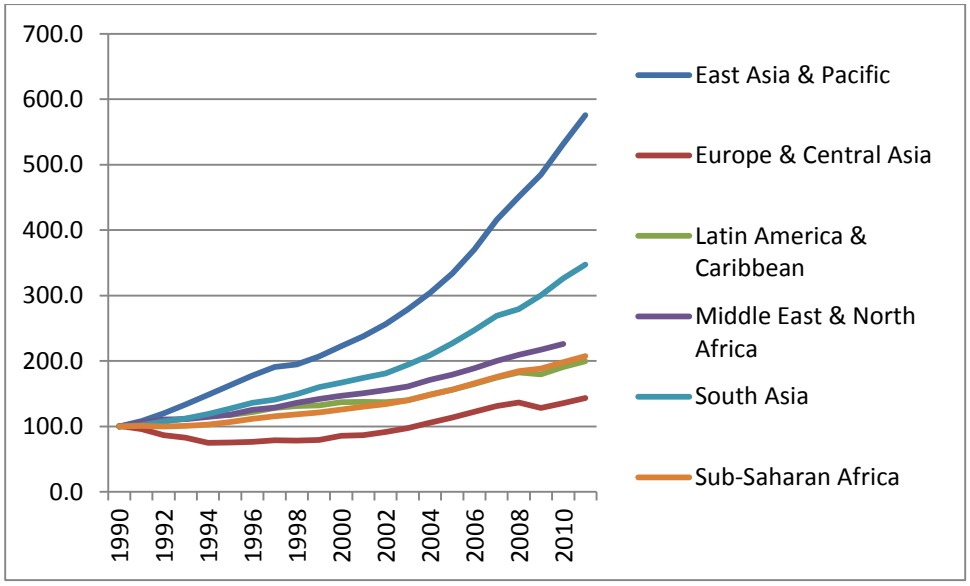
Figure 3 Index Number of for GDP (1990=100)



Source: World Bank Development Indicators

The increase in GDP has been most rapid in E. Asia followed by that in S. Asia (See Figure 4).

Figure 4 Index Number for GDP by Developing Country Region
(1990=100)

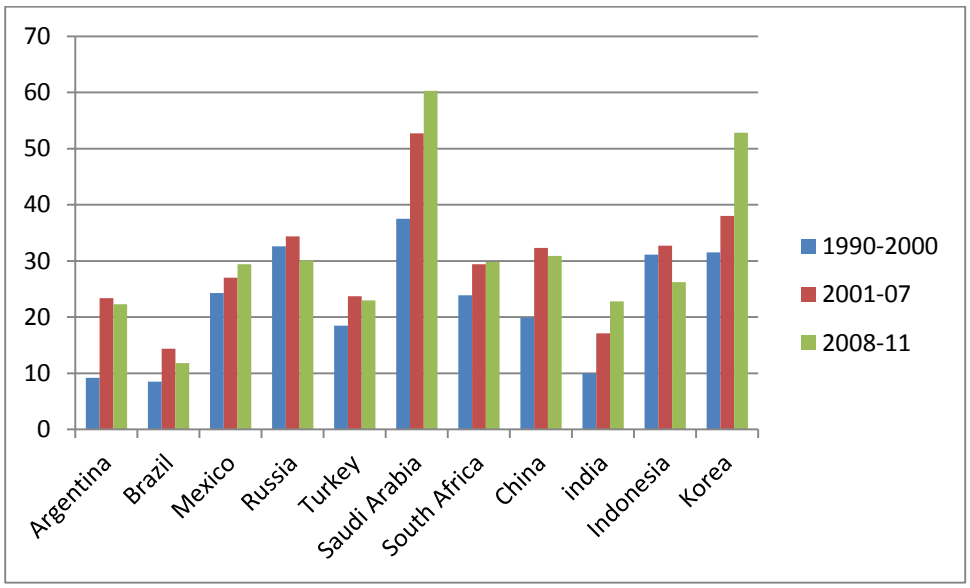


Source: World Bank Development Indicators

GDP has increased the slowest in Europe and Central Asia where it started growing only in the mid-1990s.

The share of exports of goods and services in GDP increased for the major developing countries in the years before the financial crisis (Figure 5). Since the financial crisis the picture is more mixed; 6 countries have seen the share drop while the share has continued to increase in 5 countries. But for all countries, except Indonesia, the average share in the period 2008-11 was higher than the average share in the period 1990-2000.

Figure 5 Share of Exports of Goods and Services in GDP (%) for Major Developing Countries

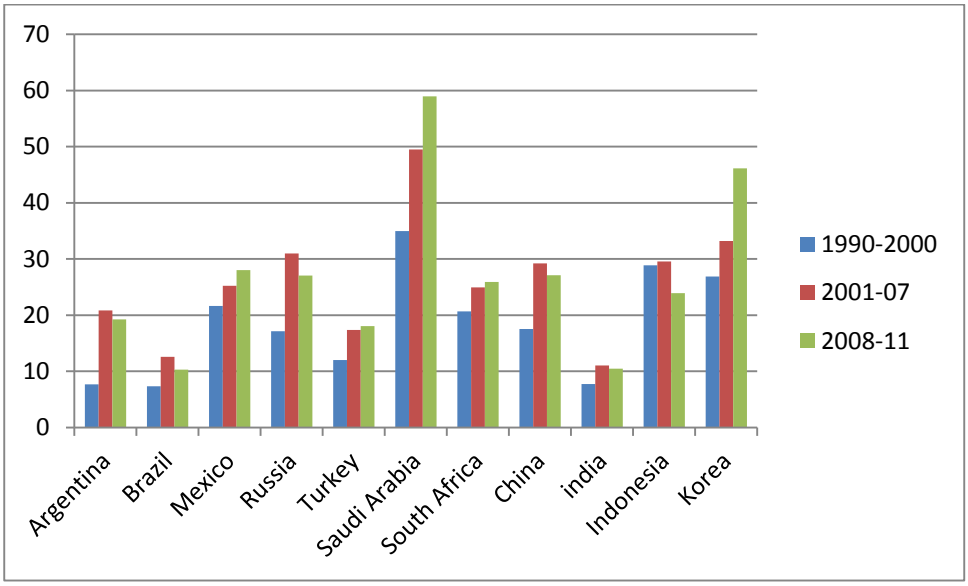


Source: World Bank Development Indicators

A similar picture is presented for the share of exports of goods in GDP. The share increased in all the major developing countries before the financial crisis. But again the picture after the crisis is mixed with the share in about half the countries continuing to increase, while it declined for the other half.

Figure 6 Share of Exports of Goods in GDP (%)

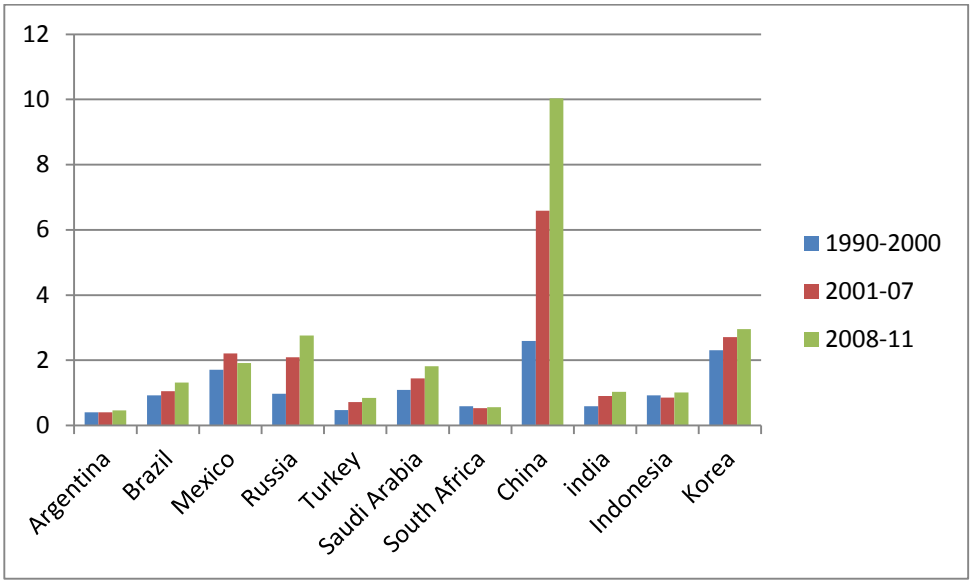
For major Developing Countries



Source: World Bank Development Indicators

The picture is, however, slightly different if we look at the share of major countries in world exports. Except for South Africa the share continued to increase even after the financial crisis (Figure 7).

Figure 7 Share of Exports of major Developing Countries in World Exports (%)



Source: World Bank Development Indicators

The share of developing country exports destined for other developing countries has been increasing (Table2) and has reached more than 50 %. The slow increase in this share before the crisis of 2008 has accelerated since the crisis as the growth in developed economies has stagnated. It is also interesting to note that more than 50 percent of world exports are now destined for developing countries a sharp increase since 2005.[6]

[6] The increase in this share is also a reflection of the trade liberalization that has been undertaken by developing countries who have significantly reduced tariffs and quantitative restrictions on imports.

Table 2 Share of Exports Destined for Developing Countries

(% of Total Exports)

From	1995	2000	2005	2011
World	28.5	28.3	30.9	57.2
Developing Countries	42.6	40.4	46.0	55.2
East Asia	50.0	45.8	51.1	59.0
South Asia	35.1	50.0	48.8	58.6
Latin America	28.3	22.9	29.2	41.1
Middle East and North Africa	37.8	39.8	48.2	64.6
Sub-Saharan Africa	41.5	33.6	36.2	48.0

Source: UNCTAD STAT

Growth of trade in absolute amounts has been particularly important among Asian countries and Latin American countries. Trade among East Asian countries increased between 1995 and 2011 by 450 percent and among Latin American countries by 382 percent. In contrast, trade among countries in Sub-Saharan Africa (SSA) grew by only 126 percent (Table 3). For most regions, the slowest growth of exports was to SSA and the fastest to either E. Asia or S. Asia, except for S. Asia whose exports grew fastest to LAC.

Table 3 Growth of exports by destination, 2011-1995 (% increase)

To From	E. Asia	S. Asia	LAC	MNA	SSA
E Asia	450	1076	841	693	850
S Asia	1208	963	1700	1442	635
LA	1069	965	382	778	541
MNA	1174	1610	648	595	1375
SSA	1459	1670	737	557	126

Source: UNCTAD STAT

It is also significant that trade among developing country regions has diversified (Table 4). The share of intra regional trade has declined in all the regions.

Table 4 Distribution of Exports to Developing Regions

	E. Asia		S. Asia		LA		MNA		SSA	
	1995	2011	1995	2011	1995	2011	1995	2011	1995	2011
E Asia	83.2	65.6	3.9	9.9	5.3	10.7	5.2	8.9	2.3	4.7
S Asia	44.8	45.9	14.2	12.8	3.4	5.0	22.4	27.6	14.6	8.6
LA	18.4	34.8	3.1	4.9	70.8	51.2	4.9	6.5	2.6	2.5
MNA	45.5	50.6	16.0	23.8	3.6	2.3	31.7	19.2	3.1	4.0
SSA	18.2	46.6	5.2	15.3	5.8	8.1	4.3	4.7	66.1	25.2

Source: UNCTAD STAT

There has been a sharp increase in the share of exports from 11 major developing countries to other developing countries (Table 5). For all of them, except South Africa where the share was already very high in 1995, the share of exports destined to developing countries is higher in 2011 than it was in 1995. Also for all of them except Mexico and Russia the share going to developing countries is higher than the share going to the developed countries whereas in 1995 more exports were destined for developed country markets for all these countries except Argentina. Furthermore, the share going to developing countries is greater than 50 percent for most of these economies.

Table 5 Destination of Exports of Major Developing Countries

(% of Total Exports)

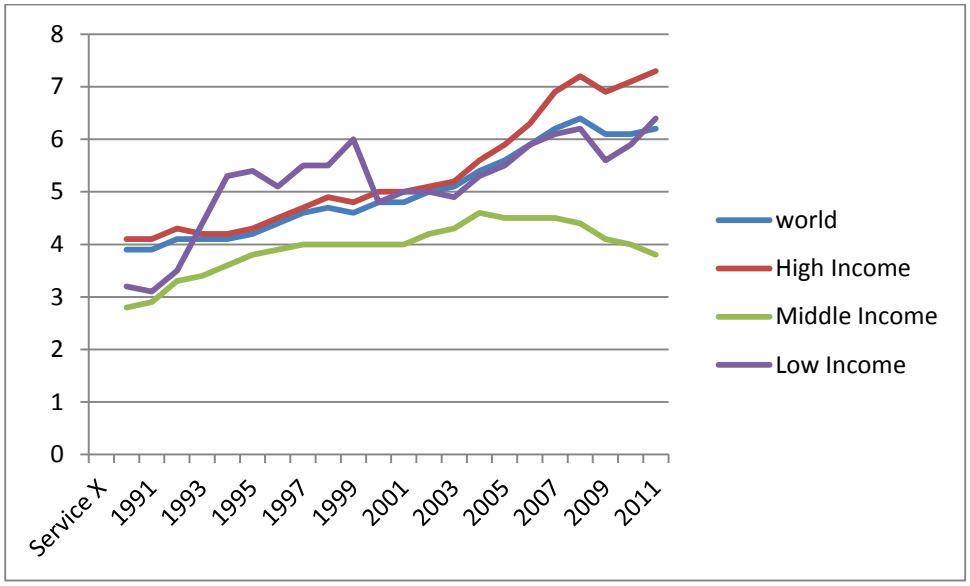
	Developed Countries			Developing Countries		
	1995	2005	2011	1995	2005	2011
Argentina	34.8	31.2	27.7	64.7	65.1	69.0
Brazil	57.3	48.2	37.4	40.4	47.1	58.6
Mexico	92.3	93.1	88.5	7.6	6.9	11.3
Russia	51.0	67.1	57.8	15.2	18.7	22.2
S, Arabia	56.1	51.1	39.4	43.9	46.9	60.5
S. Africa	36.1	64.6	45.3	61.9	34.5	53.7
Turkey	68.4	68.4	54.9	19.3	19.4	31.2
China	52.3	55.4	47.8	46.3	41.7	48.5
India	58.6	45.2	34.1	38.3	53.3	58.6
Indonesia		48.4	38.3		51.1	60.9
Korea	51.4	42.3	31.0	46.9	55.5	66.2

Note The totals do not add to 100 because of exports to transition economies.
Source: UNCTAD STAT

Section II-b-2 Trade in Services

The behavior of exports of services is different from that of exports of goods. Exports of services from low income countries have expanded relatively rapidly and as a percentage of GDP are larger than exports from middle income countries and have almost caught up to the share of service exports in GDP in the high income countries (Figure 5).

Figure 5 Share of Service Exports in GDP (percent)

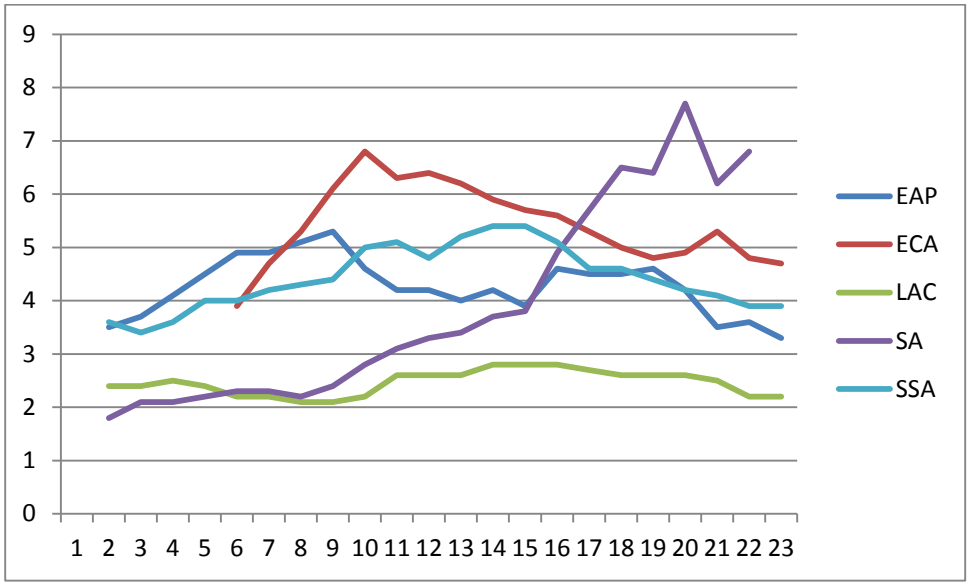


Source: World Bank World Development Indicators

The share of service exports in GDP increased in the middle income countries till 2004, but declined after that.

As far as the regions are concerned only SA shows a consistent increase. The other regions depict a hump, first an increase and then a decrease so that the final share is either the same or only slightly higher (Figure 6).

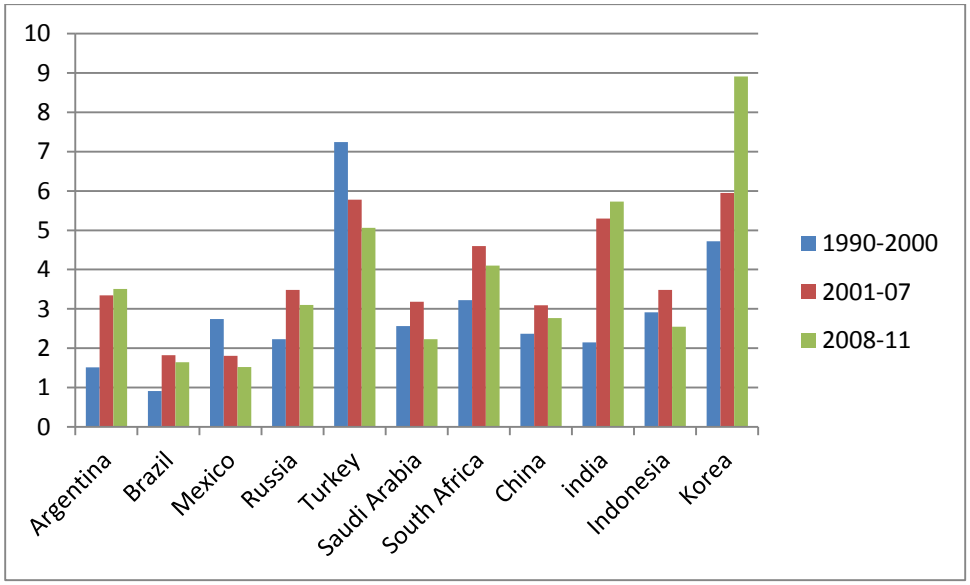
Figure 6 Share of Service exports in GDP by Developing Country Region
(percent)



Source: World Bank World Development Indicators

The performance of the large developing countries as far as service exports is not very good. 7 of the 11 countries experienced a decline in the share of service exports to GDP after the financial crisis (figure 7). What is perhaps even more important is that for 4 of the countries the share was lower in the period 2008-11 than in the period 1990-2000.

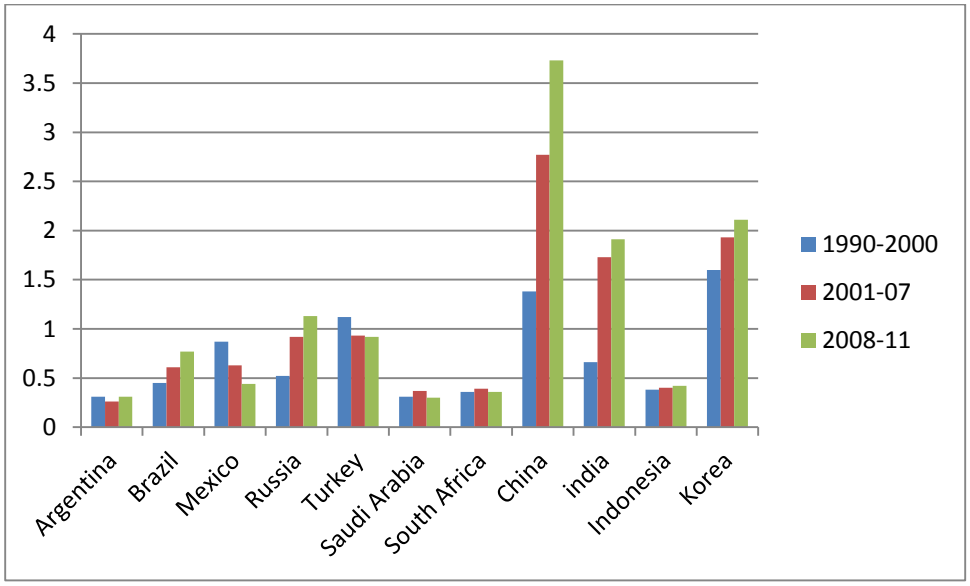
Figure 7 Service Exports of Major Developing Countries
(% of GDP)



Source: World Bank World Development Indicators

These large developing economies have also not done as well in terms of their share of world exports of services (Figure 8). For two of the economies, Mexico and Turkey, the share was lower in the period 2008-11 than in the period 1990-2000 and for another 4 it was the same.

Figure 8 Service Exports of Major Developing Countries
(% of World Service Exports)



Source: World Bank World Development Indicators

We now study the components of services exports. We analyze the share of such exports in GDP and the share of each region and country's exports as a percent of world exports. The percent share of a country's GDP provides information about the impact of such exports on the country's GDP, namely its growth effect, while the share of world exports provides information on the competitiveness of the country in that area. We look at exports of tourism services, transport services, insurance and financial services and IT related business services. The data on exports is measured on a balance of payments basis and is not value-added.

The shares of exports of the different kinds of services in GDP are relatively constant in the period 1990-2011. The only exceptions are that the importance of exports of insurance and financial services and that of IT related services increased as a percent of GDP in the high income countries and became much higher than those in the middle and low income countries. Exports of

IT-related services also increased as a percent of GDP in the middle income countries. There is not much difference in the exports of travel and transport services among the high, middle and low income countries.

As far as the different regions are concerned, exports of most services as a percent of GDP declined or were relatively constant in LAC, whereas exports of most services except travel related ones increased as a share of GDP in SA. In EAP and SSA exports of transport and travel services increased as a percent of GDP, but exports of financial and IT related services maintained a relatively constant share of GDP.

The high income countries have a very large share of world exports of all the services, though this share has been declining. This share has decreased the least for exports of insurance and IT related services. The middle income countries have increased their share of exports of services; but the least increase has been in the share of exports of insurance and IT related services. The low income countries have generally had a stagnant share of world exports of services, and this share is very small for insurance and IT related services.

Table 6a Exports of Transport Services

	% of GDP			% of World Exports		
	1990-2000	2001-07	2008-11	1990-2000	2001-07	2008-11
World	0.6	1.0	1.5			
High Income	1.1	1.2	1.4	86.0	82.5	78.1
Middle Income	0.8	1.0	0.9	13.5	16.9	21.1
Low Income	1.1	1.2	1.4	0.6	0.6	0.8
EAP	0.7	0.9	0.7	3.2	5.1	6.5
LAC	1.3	1.2	1.0	3.2	2.8	2.9
SA	0.6	0.4	0.3	1.0	1.4	1.8
SSA	0.6	1.0	1.5	1.2	1.1	1.2

Source: World Bank World Development Indicators

Table 6b Exports of Travel Services

	% of GDP			% of World Exports		
	1990-2000	2001-07	2008-11	1990-2000	2001-07	2008-11
World	0.6	1.0	1.5			
High Income	1.4	1.5	1.5	81.2	74.9	70.9
Middle Income	1.5	1.8	1.4	18.3	24.4	28.1
Low Income	1.5	2.1	2.3	0.6	0.7	1.0
EAP	2.1	2.0	1.3	6.4	8.7	9.7
LAC	2.7	2.6	2.0	4.8	4.9	4.9
SA	0.7	0.4	0.3	0.9	1.2	1.6
SSA	0.9	2.2	3.3	1.3	1.9	2.1

Source: World Bank World Development Indicators

Table 6c Exports of Insurance and Financial Services

	% of GDP			% of World Exports		
	1990-2000	2001-07	2008-11	1990-2000	2001-07	2008-11
World	0.6	1.0	1.5			
High Income	0.3	0.6	0.8	93.8	95.0	93.5
Middle Income	0.1	0.1	0.1	6.2	4.9	6.5
Low Income	neg	neg	neg	neg	0.1	neg
EAP	0.1	0.0	0.1	1.3	0.7	0.9
LAC	0.3	0.3	0.3	2.4	1.5	1.5
SA	0.1	0.1	0.1	0.3	1.0	1.7
SSA	0.1	0.2	0.3	0.7	0.5	0.5

Source: World Bank World Development Indicators

Table 6d Exports of IT Related Services

	% of GDP			% of World Exports		
	1990-2000	2001-07	2008-11	1990-2000	2001-07	2008-11
World	0.6	1.0	1.5			
High Income	1.7	2.4	3.3	87.1	86.2	82.0
Middle Income	1.2	1.5	1.7	12.2	12.2	17.5
Low Income	2.1	2.0	2.2	0.7	0.5	0.5
EAP	1.6	1.4	1.6	4.4	4.4	6.2
LAC	1.3	1.4	1.6	2.0	1.8	2.0
SA	1.0	1.8	1.7	1.2	3.5	3.6
SSA	0.8	1.4	1.8	1.0	0.8	0.6

Source: World Bank World Development Indicators

A majority of large developing economies increased their share of world exports of services. But they were the least successful in the area of financial and IT related services, where 5 of the 11 experienced a decline in their share of world exports. But in terms of the share of exports in GDP the share of exports fell except for financial services where it increased in all large countries except Indonesia. In the case of IT related services in 4 countries the share of such exports in

GDP increased while for 5 it decreased. However, most large developing countries saw a fall in the share of exports of transport and travel services as a percent of GDP.

Table 7a Exports of Transport Services

	% of GDP		% of World Exports	
	2005-07	2008-11	2005-07	2008-11
Argentina	0.7	0.5	0.2	0.2
Brazil	0.3	0.3	0.5	0.6
Mexico	0.2	0.1	0.2	0.1
Russia	1.1	1.0	1.5	1.7
Saudi Arabia	0.6	0.4	0.3	0.2
South Africa	0.6	0.5	0.2	0.2
Turkey	1.0	1.3	0.8	1.1
China	0.8	0.6	3.2	3.8
India	0.9	0.9	1.2	1.6
Indonesia	0.7	0.5	0.3	0.3
Korea	2.8	3.7	3.9	4.3

Source: World Bank World Development Indicators

Table 7b Exports of Travel Services

	% of GDP		% of World Exports	
	2005-07	2008-11	2005-07	2008-11
Argentina	1.5	1.3	0.4	0.5
Brazil	0.4	0.3	0.5	0.6
Mexico	1.3	1.2	1.5	1.2
Russia	0.8	0.7	1.0	1.0
Saudi Arabia	neg	neg	0.6	0.7
South Africa	3.1	2.6	1.0	0.9
Turkey	3.3	3.1	2.2	2.2
China	1.3	0.9	4.2	4.4
India	0.9	0.9	1.1	1.4
Indonesia	1.4	1.1	0.6	0.7
Korea	0.6	1.0	0.7	1.1

Source: World Bank World Development Indicators

Table 7c Exports of Financial Services

	% of GDP		% of World Exports	
	2005-07	2008-11	2005-07	2008-11
Argentina	neg	neg	neg	neg
Brazil	1.0	1.2	0.5	0.7
Mexico	1.7	1.8	0.7	0.6
Russia	1.0	1.1	0.4	0.5
Saudi Arabia	neg	2.0	neg	0.3
South Africa	3.2	3.3	0.4	0.3
Turkey	1.5	1.9	0.4	0.4
China	0.3	0.5	0.4	0.8
India	3.5	4.5	1.4	2.1
Indonesia	0.9	0.5	0.1	0.1
Korea	0.3	0.3	1.2	1.1

Source: World Bank World Development Indicators

Table 7d Exports of IT Related Services

	% of GDP		% 0f World Exports	
	2005-07	2008-11	2005-07	2008-11
Argentina	1.3	1.6	0.2	0.4
Brazil	0.8	0.9	0.7	1.0
Mexico	0.1	neg	0.1	neg
Russia	1.7	1.7	1.4	1.5
Saudi Arabia	1.8	0.1	0.5	neg
South Africa	0.6	0.6	0.1	0.1
Turkey	0.5	0.4	0.2	0.2
China	2.3	1.7	4.8	5.2
India	5.0	5.4	3.9	4.8
Indonesia	1.4	0.9	0.4	0.4
Korea	2.2	3.3	1.8	2.0

Source: World Bank World Development Indicators

In brief, developing countries as a group and even many of the large developing countries have had less success in exporting services, particularly the dynamic financial and IT related services, than in exporting goods.

Section II-b-3 Financial Cooperation

Financial cooperation can affect flows of financial variables, e.g. FDI and bonds and bank loans or more broadly linkages between capital markets, or it can affect the structure of financial institutions. An example of the latter would be establishment of a branch of a bank in another developing country. We first discuss financial flows prominent among which is foreign direct investment (FDI).

FDI

FDI, both inward and outward, has become very important for developing countries. Share of inward FDI in GDP in developing countries has become greater than that in developed countries (Table 8). Outward FDI had seen a large surge before the 2008 financial crisis (Table 9). Since then it has stagnated. But outward FDI is mainly in the middle income countries. There is still little outward FDI from low income countries. This suggests that companies in middle income developing countries have advantages that can only be exploited through FDI. These advantages usually stem from the capacity of these companies to innovate.

Table 8 Inward Flows of FDI (percent of GDP)

	(average for the period)			
	1990-2000	2001-05	2006-07	2008-11
World	1.6	2.1	3.9	2.5
High Income	1.5	1.9	4.0	2.4
Middle Income	2.0	2.6	3.7	3.0
Low Income	0.9	2.2	2.6	3.4
EAP	3.3	3.0	4.2	3.2
ECA	1.0	2.5	5.1	3.7
LAC	2.2	3.0	2.9	2.7
MNA	0.7	2.0	3.9	2.5
S Asia	0.5	0.9	2.2	2.2
SSA	1.4	3.2	2.8	3.3
Argentina	2.7	2.0	2.5	1.9
Brazil	1.8	2.7	2.5	2.6
Mexico	2.3	3.4	2.6	2.0
Russia	0.8	1.6	3.6	3.3
S. Arabia	0.4	0.6	5.7	6.8
S. Africa	0.6	2.2	1.0	1.8
Turkey	0.4	1.1	3.6	1.8
China	3.8	3.4	4.5	3.4
India	0.4	0.9	2.1	2.4
Indonesia	0.8	0.3	1.5	1.7
Korea	0.7	0.7	0.3	0.3

Source: World Bank Development Indicators

Most of the large developing countries, and these are all members of the G20, have experienced an increase in the share of inward FDI in GDP. Korea and Argentina are significant exceptions, but FDI is very small in the case of Korea. Similarly, outward flow of FDI from most large developing countries increased strongly before the 2008 financial crisis (Table 2). But the picture is mixed after 2008. Of the 11 developing countries considered here, share of outward FDI increased in 6 but declined in 5.

Table 9 Outward Flows of FDI (percent of GDP)

	(average for the period)			
	1990-2000	2001-05	2006-07	2008-11
World	1.7	2.2	3.8	2.9
High Income	1.9	2.6	4.7	3.6
Middle Income	0.3	0.4	1.1	1.1
Low Income				
EAP	0.3	0.4	0.9	1.1
ECA	0.3	0.8	1.7	2.0
LAC	0.4	0.5	1.0	0.6
MNA				0.4
S Asia	0.0	0.3	1.3	1.0
SSA		0.3	1.0	1.6
Argentina	0.6	0.2	0.8	0.3
Brazil	0.2	0.4	1.6	0.3
Mexico		0.5	0.7	0.9
Russia	0.6	1.6	2.9	3.5
S. Arabia		-0.1	-0.0	0.7
S. Africa	0.8	-0.4	1.6	-0.1
Turkey	0.1	0.2	0.2	0.3
China	0.4	0.3	0.7	0.9
India	0.0	0.3	1.4	1.2
Indonesia	0.2	1.2	0.9	0.7
Korea	0.7	0.6	1.5	2.1

Source: World Bank Development Indicators

The share of developed countries after fluctuating in earlier years has steadily decreased since 2000 and the share of developing countries has increased (Table 10). Developed countries have a larger share in outward flows than in inward flows.

Table 10 Share of Developed and Developing Countries in FDI Flows

Inflows	Average 1989-94	1995	2000	2005	2011
Developed Countries	68.7	61.5	79.1	63.0	49.1
Developing Countries	29.8	34.2	18.9	33.8	44.9
Africa	2.0	1.4	0.6	3.9	2.8
Latin America	8.7	9.8	6.8	7.9	14.2
South Asia	0.4	0.9	0.2	1.5	2.6
West Asia	1.1	0.8	0.3	4.5	3.2
East Asia	17.1	21.4	10.6	16.0	22.0
Outflows					
Developed Countries	89.0	86.1	91.0	84.5	73.0
Developing Countries	10.7	13.8	8.7	13.8	21.5
Africa	0.4	0.1	0.1	0.2	0.2
Latin America	1.6	2.1	1.2	3.9	5.9
South Asia	…	0.0	0.0	0.4	0.9
West Asia	0.1	-0.3	0.1	1.4	1.5
East Asia	8.8	11.7	7.2	7.9	14.2

Source: UNCTAD World Investment Data Base

Among the developing country regions Latin America and East Asia have the largest shares in both inward and outward FDI. But the other regions, except Africa, are also showing a rapid increase in inward and outward FDI though from a smaller base.

Share of developing countries in inward and outward flows of FDI have increased and this is true for all the three sectors (Table 11). The increase in investment in services has been particularly large. This may help to raise services exports from regions where these have stagnated.

There is limited data on the destination of FDI flows. 80 percent of China's FDI outflow went to developing countries in the period 2008-11, compared to an even higher 90 percent in the period

2003-07.[7] Almost 60 percent of outflows from India go to other developing countries. In Brazil the share increased from 40 percent during 2006-07 to over 48 percent during 2008-10. Korea invests almost 50 percent of its FDI in other developing countries. But Russia and Turkey invested only about 11 percent of their FDI outflows in developing countries in the period 2008-11, though this was an increase from the mere 3 percent in earlier years.

Table 11 FDI flows from and to developing Countries

(% of World Flows in each sector)

	From Developing Countries		To Developing Countries	
	1990	2007	1990	2007
Total	1.1	11.8	18.7	24.3
Primary	1.6	3.9	16.6	20.5
Manufacturing	0.9	3.9	9.8	21.6
Services	1.2	15.8	17.9	25.3

Source: UNCTAD World Investment Report 2012

[7] The data is from the UNCTAD FDI/TNC. It is very fragmentary providing information for only a few of the large emerging economies and that also for a limited number of years.

Cooperation in the Financial Sector

Financial cooperation among developing countries could lead to a better allocation of the savings of developing countries. In particular, the excess savings of some can be channeled for use in countries which lack adequate savings. This could be done through their banks if these set up operations in other developing countries. Some of the largest commercial banks are in the large developing countries such as Brazil and China. But as yet they have few branches in other developing countries. For instance, a survey of banks in Malaysia, Philippines and Thailand showed that in 2009, domestic banks accounted for 82% of total commercial bank assets. The share of other ASEAN banks was 8.5 percent in Malaysia, 3.7 % in Thailand and only 0.4 % in the Philippines (Asian Development Bank, *The Road to ASEAN Financial Integration*, ADB, Manila, 2013). According to the study adoption of appropriate harmonization policies in areas such as entry and licensing, supervision, risk management procedures and transparency, could result in this share tripling by 2025 or 2030. As discussed below, harmonization policies need careful elaboration and implementation given the diversity of banking systems in the different countries in ASEAN. Developing countries, after their experience with the debt crisis of the 1980s and the Asian financial crisis of 1996-97, are chary of commercial borrowings. Neither borrowings from banks nor through bonds have amounted to even 1 percent of GDP in the last almost two decades (Table 12).

Table 12 Financial Flows to Developing Regions

(% of GDP)

	Bonds		Bank Loans	
	1995	2009	1995	2009
EAP	0.6	0.1	0.7	-0.1
LAC	0.6	1.0	0.7	-0.2
SA	0.1	0.1	0.3	0.5
SSA	0	0.2	0.1	0.4

Source: World Bank World Development Indicators

The preferred method of inflows has been FDI (table 13). There has also been some increase in portfolio flows. This would suggest that integration of stock markets may lead to greater flow of funds than banks at this stage. This hypothesis is also borne out by convergence in the share prices of the different stock exchanges in Asia (Givanni Capanelli, Jong-Wha Lee and Peter Petri, Developing Indicators for Regional Economic Integration and Cooperation, Asian Development Bank, Manila, 2009).[8]

[8] Of course, this convergence could be because of actions of investors in the developed countries whose arbitrage actions lead to this convergence.

Table 13 FDI and Portfolio Flows to Developing Countries

(% of GDP)

	FDI Inflows		Portfolio Equity Investment	
	1990	2007	1990	2007
Low Income	0.4	4.0	0.1	1.6
Middle Income	0.7	0.7	…	0.9

Note: Portfolio investments in the form of bonds were negligible in 1990 and remained very small even in 2007.

Source: World Bank World Development Indicators (2007, 2009)

The heads of state of the G20 at the time of the last G20 meeting in Mexico asked their finance ministers and central bank governors to study the possibility of setting up a South Bank which had been mooted at an earlier meeting of the BRICS, and this could further financial cooperation.

Section II-b-4 Technology Cooperation

Developing countries are increasing their cooperation in the area of technology. As noted above increased trade among developing countries can foster technological development. This is mainly through import of better quality capital goods. But there has also been a trend towards greater cooperation in developing newer technologies that are more suited to the needs of developing countries. This is what has become to be called frugal engineering—building simpler and cheaper machines that are adequate to the needs of developing countries. This cooperation encompasses cooperation among public sector bodies, among private sector companies and in joint public private partnerships.

There has been a significant increase in trade in capital goods among developing countries. The share of capital goods imported from developing countries in total imports of capital goods by developing countries has increased from 35 percent in 1995 to 54 percent in 2010. It has increased in all regions, but most significantly in South Asia and South-East Asia. Furthermore, it has increased in the case of Brazil and India while it has been almost constant in the case of China. Such an increase illustrates the relevance of Southern technologies as embodied in capital goods for other developing countries. The share of high technology capital goods has increased again illustrating the increasing technological capacity of the South.

Most of the increasing technological collaboration among Southern enterprises is in the area of pharmaceuticals and medical equipment. An example is the joint venture between Quality Chemicals in Uganda and Cipla Pharmaceuticals of India to produce drugs for the treatment of HIV/AIDS and malaria. The joint venture is now exporting these drugs to neighbouring countries. Another example is the joint venture between VACSERA of Egypt and Dongbao of China to produce recombinant insulin and which has resulted in the elimination of shortages of insulin in Egypt. A study found that a quarter of health related biotech firms in developing countries had built linkages with firms in other developing countries.

We now consider some examples of public-public sector technological collaboration. Brazil's technical collaboration with other developing countries concentrates in the areas of agriculture, health and education. Embrapa's activities in the area of agriculture consist of structuring projects, technical training and the Africa-Brazil platform for agricultural innovation. Embrapa has 78 bilateral agreements with 56 countries and 89 foreign agencies. For instance, it has a project to develop suitable cotton varieties in 4 West African cotton growing countries and has helped Mali establish a laboratory for bio-technology. India's Technical Economic Cooperation programme

includes providing training and capacity building, project cooperation and Indian experts providing technical assistance. The India, Brazil and South Africa initiative includes technical collaboration in pharmaceuticals and health care, ICTs etc. Similarly China's technical collaboration covers many areas. For instance, Huawei is providing assistance to Angola in the area of wireless technology and there is a project to set up, in collaboration with UNIDO, 100 mini hydro power plants in 10 African countries

ASEAN has set up the Karbi Initiative, It is a fund where each ASEAN member donates $1 million a year and others such as China, India and Japan can also contribute. The Fund has priority technical development programmes in 6 areas.

Section II-b-5 Monetary Cooperation

The establishment of the International Monetary Fund (IMF) at the end of the Second World War was a very significant institutional innovation. It provided institutional finance to countries in need of financing for balance of payments (BOP) purposes. Its role was important as private financing for BOP purposes was not available and remained unavailable for most developing countries. For more than 30 years after the establishment of the IMF developing countries kept minimal reserves. The oft stated norm was to have reserves equal to three months worth of imports. Reserves are a form of hoarding of savings rather than using them to raise investment. Gradually private financing became available to developing countries particularly the middle income countries. But such financing became unavailable when developing countries were faced with a severe BOP crisis. Developing countries borrowed from the IMF in those circumstances. But sometimes considerable time was needed before agreement could be reached on the

conditions under IMF financing would be available, time during which the economic conditions in the country deteriorated. Furthermore, developing countries did not like the conditions that he IMF attached to its loans.

Developing countries have been trying to reform the governance structure of the IMF and to have a larger voice in its governance. But it is also important to perhaps change its lending policies. Its lending policies have resulted in a large accumulation of reserves by developing countires and not merely China though China's surpluses and reserve accumulation have been singled out as one of the causes of the 2008 financial crisis and the G20 have said that these imbalances need to be corrected. We discuss the issue of reserve accumulation by developing countries.

There is no clear cut rule for an appropriate level of reserves that a country should hold. Since the Asian financial crisis many developing countries have been increasing their reserve holdings in order not to have to approach the IMF in case of a balance of payments deficit.

Table 14a Reserves as % of GDP

	1997	1999	2001	2003	2005	2007	2008	2009	2010	2011	R1	R2
Argentina	7.7	9.3	5.4	10.9	15.3	17.7	14.2	15.6	14.2	10.4	2.3	0.6
Brazil	5.9	6.2	6.5	8.9	6.1	13.2	11.7	14.7	13.5	14.2	2.2	1.1
China	15.4	14.9	16.6	25.4	36.8	44.2	43.5	49.1	49.1	44.5	2.9	1.1
India	6.7	7.8	10.0	16.8	16.5	22.3	21.0	20.9	17.6	16.0	3.3	0.7
Indonesia	8.11	19.5	17.5	15.4	12.1	13.1	10.1	12.2	13.6	13.0	1.6	1.0
Korea	4.0	16.6	20.4	24.2	24.9	25.0	21.6	32.4	28.8	27.5	6.3	1.1
Mexico	7.2	6.6	7.2	8.4	8.7	8.4	8.7	11.4	11.6	12.9	1.2	1.5
Russia	4.3	6.3	11.8	18.2	23.9	36.8	25.7	35.9	32.2	26.8	8.5	0.7
S. Africa	4.0	5.6	6.4	4.8	8.3	11.5	12.4	14.0	12.0	11.9	2.9	1.0
S. Arabia	9.8	11.4	10.3	11.4	49.9	80.4	94.8	111.8	101.9	96.5	8.2	1.2
Turkey	10.4	9.8	10.2	11.7	10.9	11.8	10.1	12.2	11.8	11.4	1.1	1.0

Note: R1 is ratio of 2007 to 1997 and R2 is ratio of 2011 to 2007.

The major countries have increased the level of reserves whether measured as a percentage of GDP (Table 14a) or of imports (Table 14b). All the 11 countries increased the level of reserves as percentage of GDP and imports between 1997 and 2007.

Table 14b Reserves as % of Imports of Goods and Services

	1997	1999	2001	2003	2005	2007	2008	2009	2010	2011	R1	R2
Argentina	59.9	80.6	53.1	76.9	79.9	87.0	68.8	97.7	76.9	53.1	1.5	0.6
Brazil	65.8	57.3	48.0	73.9	52.9	111.5	87.0	132.1	113.1	112.6	1.7	1.0
China	89.1	85.0	81.1	92.7	116.8	149.4	159.5	220.3	184.0	162.9	1.7	1.1
India	57.2	58.7	75.2	109.1	75.0	91.3	73.4	82.0	66.8	52.6	1.6	0.6
Indonesia	28.8	71.2	56.9	66.7	40.6	51.9	35.2	57.4	59.2	52.2	1.8	1.0
Korea	12.0	51.4	60.9	73.0	68.2	61.9	39.9	70.4	57.9	50.8	5.2	0.8
Mexico	23.7	20.4	24.2	31.4	30.6	28.5	28.8	38.9	36.9	39.2	1.2	1.4
Russia	19.3	24.0	48.9	76.3	110.9	171.0	116.3	175.3	148.7	120.1	8.9	0.7
S.Africa	17.1	24.8	24.7	19.0	30.0	33.6	32.0	49.5	43.8	40.6	2.0	1.2
Saudi Arabia	37.5	48.9	42.8	47.4	179.4	212.9	255.4	259.8	263.7	314.9	5.7	1.5
Turkey	34.2	50.7	43.6	48.8	42.9	43.0	35.6	49.9	43.9	34.8	1.3	0.8

Note: R1 is ratio of 2007 to 1997 and R2 is ratio of 2011 to 2007.

While China had a high level of reserves it did not have the highest level of reserves. As a percentage of GDP it had the second highest level of reserves and as a percentage of imports it had the third highest level. Nor did it have the fastest rate of increase in these percentages. Five countries increased the share of reserves as a percentage of GDP more than China did while 5

countries raised it less. 5 countries increased reserves as a percentage of imports more than China did and 4 more slowly (Table 14b).

Table 14c Short Term debt % of Reserves

	1997	1999	2001	2003	2005	2007	2008	2009	2010	2011	R1	R2
Argentina	143	112	137	158	124	42	43	41	27	36	0.3	0.9
Brazil	67	80	79	50	45	22	19	17	19	12	0.3	0.6
China	22	9	2	21	18	13	10	10	12	15	0.6	1.1
India	18	11	6	6	6	13	17	16	19	26	0.7	2.0
Indonesia	188	73	71	54	32	33	40	36	34	35	0.2	1.1
Mexico	97	76	33	39	30	31	30	28	32	34	0.3	1.1
Russia	34	128	52	39	15	21	17	12	13	14	0.6	0.7
S. Africa	183	144	110	101	69	73	75	54	50	39	0.4	0.5
Turkey	91	96	82	65	73	56	72	66	91	95	0.6	1.7

Note: R1 is ratio of 2007 to 1997 and R2 is ratio of 2011 to 2007.

As short term loans borrowed by developing countries might not be rolled over or could be withdrawn the Greenspan Guidotti rule was enunciated that countries should hold reserves equal to their short term liabilities. But these large economies have been reducing their level of short term debt as a percentage of reserves and reserves are considerably larger than their short term debt (Table 10c).

Table 14d Reserves as % of M2

	1997	1999	2001	2003	2005	2007	2008	2009	2010	2011	R1	R2
Argentina	28.9	29.6	20.0	36.3	48.8	57.5	54.3	56.6	48.6	36.0	2.0	0.6
Brazil	15.8	14.2	13.2	18.0	11.2	21.3	18.3	21.2	19.6	19.1	1.3	1.9
Mexico	20.3	19.4	23.5	31.1	31.8	31.9	32.6	37.2	37.2	41.2	1.6	1.3
Russia	22.1	30.6	49.5	60.8	71.5	86.0	65.1	73.0	61.2	50.8	3.9	0.6
S.Arabia	22.3	22.8	21.4	22.3	107.3	145.8	180.5	151.9	157.6	168.6	6.5	1.2
S.Africa	7.4	9.8	11.0	7.7	11.9	13.9	14.7	17.2	15.4	15.7	1.9	1.1
Turkey	28.0	25.0	22.3	33.3	26.8	27.0	20.8	22.3	20.9	20.7	1.0	0.8
China	13.2	11.0	11.6	16.3	24.1	29.2	28.7	27.4	27.2	24.7	2.2	0.8
India	14.4	15.4	17.5	27.0	25.6	31.4	27.8	26.8	23.1	20.8	2.2	0.9
Indonesia	14.5	33.4	34.3	32.6	28.1	31.5	26.4	32.1	35.4	33.5	2.2	1.1
Korea	9.6	26.8	28.4	33.5	38.0	41.1	32.3	44.7	38.1	35.2	4.3	0.9

Note: R1 is ratio of 2007 to 1997 and R2 is ratio of 2011 to 2007.

Why are these large economies holding such large reserves whether measured in terms of GDP or imports or short term debt?

One explanation that has been offered is that outflow of short term loans is not the only danger that developing countries face. With the significant capital account liberalization that has occurred domestic individuals and companies can convert their liquid assets into foreign currency and transfer them out of the country. M2 is a measure of liquid assets. So adequacy of reserves should be measured against M2 as M2 maybe a good first approximation as to what can be converted into foreign exchange and transferred. On this measure China has one of the lowest ratios—it has the 8th smallest ratio. Further capital account liberalization may require China to increase its reserve holdings.

Successful pooling of reserves would avoid this hoarding and more of the savings could be used for investment. Schemes such as the Chang Mai Initiative in Asia have been agreed upon. But as yet there has been no occasion to see how it would work. Similar schemes have been talked about in other regions. But as yet nothing has been agreed upon. The heads of state of the BRICS at the last G20 meeting asked their finance ministers and central bank governors to explore schemes for better using reserves.

Chapter III The Nature of SSEC

In this section we discuss why SSEC is important and how its nature differs from that of North-South economic cooperation.

Section III-a Need for SSEC in the Current World Economic Situation

The developed countries have been in a period of slow growth. GDP has grown at an average annual rate of 0.3 per cent over the period 2008-2011, which means that GDP per capita has declined at a rate of 0.4 per cent per year. This has had a depressing effect on exports from developing countries and also on financial flows to developing countries, both official aid and private flows, Since the 2008 financial crisis growth has declined in all the developing country regions, export performance has usually worsened with a lower share of exports of goods and services in GDP and a worsening of the current account position and declines or stagnation in the share of gross fixed capital formation in GDP. For instance, the growth rate of per capita income has declined between 2006-08 and 2009-11 in Latin America and SSA from 3.7 and 3.4 percent respectively to 1.7 and 1.3 percent respectively. The current account in these regions has worsened from a surplus of 0.5 percent of GDP to a deficit of 1.0 percent in LAC and a deficit of 2.3 percent of GDP in SSA. SSEC can help reverse some of these adverse developments and help accelerate growth.

This slow growth is expected to continue over the medium term so that developing countries cannot expect the high income countries to provide a boost to their growth prospects. On the other hand, developing countries have been growing faster than the developed countries and despite the slowdown the performance of most has been better than in the 1990-2000 period. Market prospects and capabilities of developing countries in the areas of finance and technology have improved. These opportunities can be built upon to provide a self-perpetuating cycle of

growth among developing countries, The question is what is the nature of SSEC and how it can contribute to growth and also how distinctive is it from South- North economic cooperation (SNEC).

Section III-b Synergies between Trade, Technology and FDI

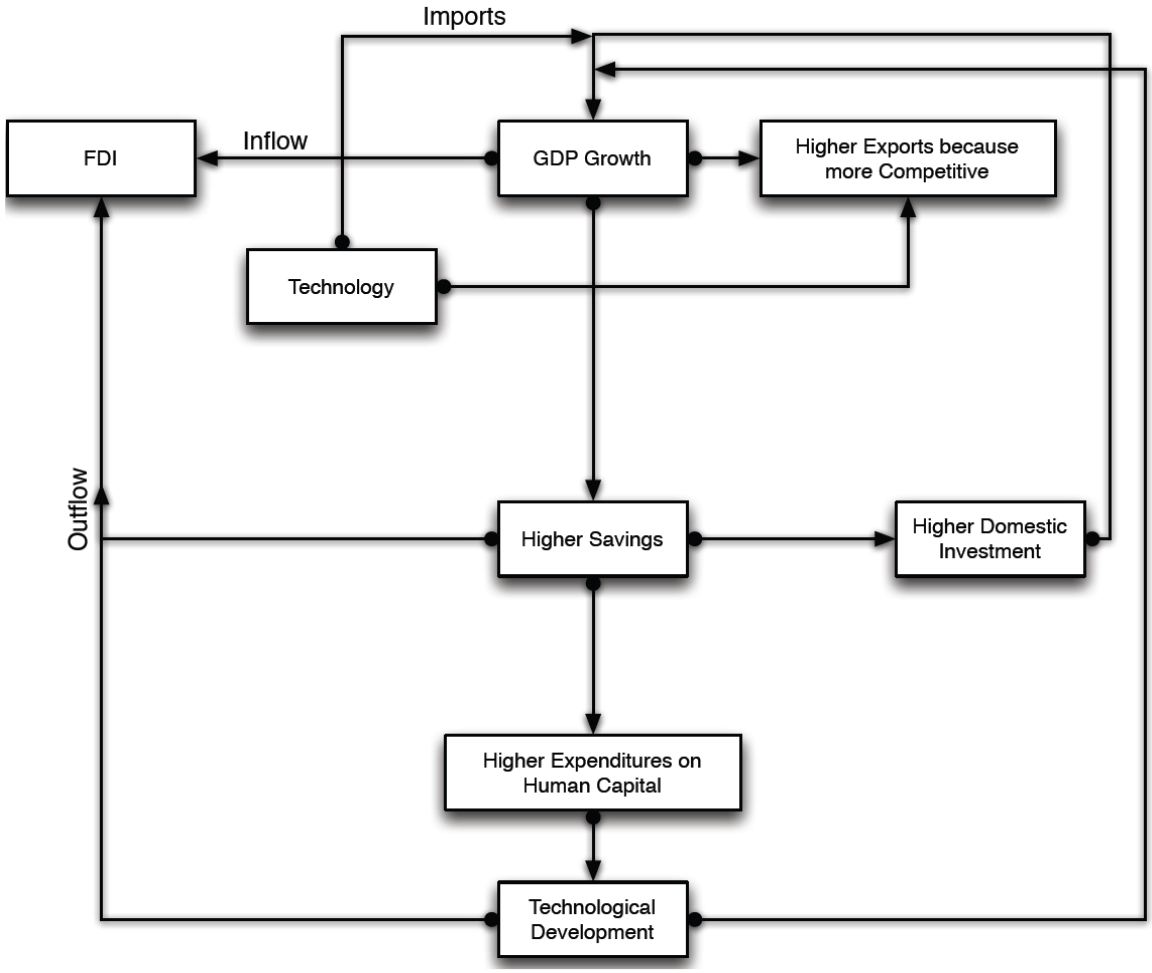
There are strong linkages between trade, FDI and technology that can multiply the benefits from SSEC (See Figure 9). FDI inflows and technology imports will lead to higher GDP growth.[9] The technology imports will lead to lower costs of production so that the goods are more competitive in the world market. The higher GDP and the lower costs will combine to raise exports from the country. At the same time the higher GDP will result in higher savings. These can be used to raise domestic investment and raise the rate of growth. The higher savings can also be used for investment in education, health, water and sanitation namely development of human capital, which will also raise the rate of growth. The improved human capital will also lead to technology development that will also raise the GDP growth rate. Better domestic technology together with some of the higher domestic savings can be used for FDI investments in other countries.[10] This will benefit other countries as well as the home country. So there is a virtuous cycle of technology, FDI and exports, depicted in the Chart on the next page. And just as trade in goods enables a country to benefit from imports that can be more cheaply produced abroad so can trade in services enable a country to benefit from importing services produced more efficiently in other countries, trade in technologies to import better technologies, trade in FDI to better utilize technologies, both those developed domestically as well as those developed elsewhere, etc. As freer flow of goods, services and technologies occurs there will be technological progress. Often

[9] In all cross section studies of the sources of growth the coefficient on FDI is about 4 times the size of the coefficient on domestic investment Barro R and Xavier Sala-i-Martin, *Economic Growth*, McGraw Hill, New York, 1995 .

[10] FDI enables companies to benefit from proprietary technologies that cannot be easily licensed.

an innovation in one chain of the production process in one country will be diffused throughout the production process for that good. Since the production process is spread over many countries the innovation could be diffused to many countries. From one company in the country the technology would be diffused to other companies in the country. The splintered production process together with freer flows is likely to lead to faster diffusion of technology.

Figure 9 Synergies between Trade, Technology and FDI



Source: Author's illustration.

Section III-c Scope for SSEC

Higher incomes and increased populations in a number of developing countries are increasing demand for agricultural products in these countries and leading to higher imports. Already many countries have benefitted from the higher prices that have resulted from this demand. For instance, Indonesia has increased its exports of vegetable oils to China and India. SSA countries have benefitted from the improvement in the terms of trade. This improvement in the terms of trade has been one of the major reasons why these economies have grown rapidly whereas starting in the 1980s till the mid 1990s they had not done so and in that earlier period the terms of trade had worsened and agricultural growth had been very poor. Growth in output would enhance the benefits the exporting countries could get from exports. While there is surplus land in many African countries labour is not so readily available. Growth of total factor productivity would help to raise output and increase the benefits that countries in SSA could get from world export opportunities. But growth of productivity in agriculture has been very low in SSA whereas it has been high in Latin America, particularly Brazil. Brazil has a number of projects in SSA to raise technology levels in agriculture. Agricultural productivity has also grown rapidly in China and SSEC would enable SSA countries access both Chinese technology and Chinese capital.[11] Increased exports to the rapidly growing developing countries in a period when agricultural exports to the developed countries are likely to grow slowly if at all would be particularly valuable.

Trade in agriculture among developing countries is one important feature of South-South trade (SST). Rapid growth in many developing countries is raising demand there while demand is

[11] Savings rates in SSA have still not recovered to the levels they had reached n the 1970s.

stagnant in the developed countries. Another important feature of SST is that developing countries export their less sophisticated products to the developed countries and their more sophisticated products to each other. SST is increasingly concentrated in capital goods. The more sophisticated products are later exported to developed countries. SST has an important learning by doing aspect which raises technological levels.

But SSEC can lead to more than higher agricultural exports to other developing countries where domestic supply cannot keep up with the demand that is being generated by higher incomes and larger populations. It is necessary to translate higher agricultural exports into a sustained period of growth. This has not always been achieved.[12] But a number of countries in East Asia, E.g. Taiwan province of China, Thailand and Malaysia, have been able to use agricultural exports and growth as the basis for industrialization. Much can be learned from this experience.

The transformation in South East Asia was helped by exports of labour intensive manufactures to developed countries. This avenue is likely to be closed because of slow growth in the developed countries. But as wages rise in industrializing countries in Asia producers in other countries around the world can replace them and also increase exports to these Asian economies. Such replacement would be easier if there is freer trade among Southern countries and there is no equivalent to the Multifibre Arrangement. There is no reason for policy makers and producers in SSA to be pessimistic about their prospects. Furthermore, as we had seen above there is no evidence that Chinese production is hurting countries in SSA. South-South Trade could play a catalytic role.

[12] A study by Arthur Lewis of the performance of a number of developing countries in the pre World War II period showed that while many countries in the developing world had been able to increase exports of primary products few had been able to convert this export success to sustained growth W. Arthur Lewis, *Tropical Development, 1880-1913, Studies in Economic Progress,* Allen Unwin, London).

Trade among Southern countries in manufacturing gains, because of intra-industry trade, the importance of scale economies and differentiated products. The importance of increasing returns to scale points to the importance of development of South-South supply chains. For instance such supply chains ending with the production of finished textile goods in Bangladesh have made that country a power house in garment exports. Technology transfers and FDI can further accelerate the process. This can help reverse the decline in the share of manufacturing in GDP. This share has fallen in LAC from about 22 percent in 1992 to 17 percent in 2011 and in SSA from 18 percent in 1991 to 12 percent in 2011. Such development can be important as only a very few countries in SSA have manufactures as the main export category. Share of manufactures in goods exports were in 2010 only 31 percent in SSA and 50 percent in LAC compared to 65percent in SA and 78 percent in EAP.

There are fears that the less industrialized countries will be stuck at the bottom of global value chains (GVCs) and these are low technology areas so that the development of these countries would be stunted. But experience shows that all countries till now have managed to move up the sophistication ladder. Furthermore, it is very difficult to start up at a higher level, the costs of doing this are enormous. It is usually easier to start at the bottom and move up.[13]

SST is generally subject to much higher barriers than North-South or North-North trade. The barriers facing SST are almost three times those facing NNT, There is however an inverse relation between importer income level and average protection level (Table 15). There is also a weak tendency for protection levels to increase as exporters' income increases.

[13] Similar fears were expressed about the use of IT related services in India, that India would be stuck with providing the low call centre services. But India has moved up the ladder and the call centre services are beginning to move to other countries.

Table 15 Simple Average Tariff Rates, 2001, by exporter and Importer Income Groups

Exporter \ Importer	High	Upper Middle	Lower Middle	Low
High	4.4	8.4	9.7	11.7
Upper Middle	5.9	8.5	11.8	13.7
Lower Middle	5.6	9.5	11.1	14.3
Low	3.6	8.7	10.0	13.4

Source: World Bank Development Indicators

Apart from a few, developing countries in general have not been successful in penetrating markets in the developed countries in the areas of financial and IT related services. Even where they have succeeded in IT related series it has been at the low end. Just as in goods trade where often the more sophisticated products are first exported to developing countries, so can SSEC serve to raise exports of financial and IT related services first to other developing countries and after a certain level of competence has been achieved to the developed countries.

Fixed capital formation in LAC and SSA is currently about 20% of GDP much lower than the peaks achieved in the 1970s. FDI can help to raise the investment level and along with technology can help to develop modern competitive industries. The technology in developing countries is more suitable for their factor endowments. Furthermore, research has shown there are more spillovers between technologies which are closer together than between technologies which are further apart in terms of being more complicated. So technology exchange between developing countries can accelerate the process of technological development through the process of diffusion of technologies.

An important feature of Southern development has been the growth of what has come to be known as “frugal engineering”. This is the development of simpler machines and gadgets which are cheaper and so more suited to the incomes in developing countries. But very often technologies require local adaptation and this is particularly important for agricultural technologies. Setting up facilities for research in the host country and having joint projects can be very important for the spread of technology. It is easier to spread technologies if joint ventures can be set up. It is therefore imperative that FDI between developing countries be encouraged. The effect of FDI in diffusion of technology is one of the reasons why in cross section growth studies the coefficient of FDI is much higher than the coefficient on fixed capital formation.

Till now students from developing countries have gone to institutions in developed countries for education. But now there are a number of highly regarded universities in developing countries though exchange of students among developing countries remains limited. Expansion of student enrollments in developing countries will further technological development in developing countries.

The role of FDI is important. Economic performance in Latin America and SSA before the 2008 crisis was much better than in the 1980s and 1990s, but investment levels remained lower than those that had been achieved in the late 1960s and 1970s. If countries on these continents are to grow faster and this is necessary to achieve the MDGs then investment levels need to be higher. There is great need for resources for investment in developing countries. In particular, excess savings in Asia can be used to raise investment in Latin America and SSA.

There are three broad channels through which trade affects innovation, imports, FDI and direct trade in technology. Trade also increases competition. Studies generally agree that trade induced

competition contributes to productivity improvement (Nobuo Kiriyama Trade and Innovation : Synthesis Report OECD Trade Policy Papers No. 135, 2012).

Financial Cooperation

The excess savings of some countries could be productively invested in other savings deficit countries. Given the size of some of the banks in developing countries they are underrepresented in other developing countries. But given their past experience of debt crises and sudden withdrawal of finance governments in developing countries are limiting their reliance on bonds and banks as sources of funds. But companies could borrow from these banks as a normal course of business. Banks from developing countries could be another source of finance for local companies.

An area where there is considerable scope for cooperation is through joint listing on stock exchanges. ASEAN countries are beginning the process of such joint listing. Such joint listing would be particularly valuable for countries that are small and so have limited stock markets. Investors who could operate in larger stock markets could better manage risk. Diversification could lead to reduction of risk. In particular small countries rely more on trade. Being able to invest in banks and stock markets of different countries would enable them to better match their portfolios with their trade and a consequent reduction of risk.

Monetary Cooperation

Developing countries have been increasing their reserves. This is a policy of self-insurance so as not to have to borrow from the IMF. Reserve accumulation means that developing countries are exporting capital to developed countries. Pooling of reserves among developing countries so that savings are translated into investment and not transferred to developed countries would accelerate

growth in developing countries. There has been limited progress in East Asia with reserve pooling, the multilateral Chang Mai Initiative (CMIM); these steps are as yet small ones and not commensurate to the problems that developing countries may face.

There has been progress with the CMIM. The sums involved have been increased. The Initiative instead of being a series of bilateral swap arrangement has been multilateralized so that a country has access to more of the entire resources raised under the initiative and not merely the amounts agreed to under the bilateral swaps. But the amounts available are limited and can be illustrated by Korea's position at the time of the 2008 financial crisis. Korea could draw on only $3.7 billion without a IMF programme as the CMIM allows a country to only draw 20 percent of the amount it can access without having an IMF programme in place. So Korea entered into a swap agreement with the US Federal Reserve for $30 billion.

Another important development has been the creation of the $100 billion Contingency Reserve Arrangement (CRA) by the BRICS. The contributions by the members have been agreed to. Furthermore, it has a simple decision making structure. Any of Brazil, China, India or Russia can authorize a loan from the CRS. But the conditions attached to such a loan have yet to be agreed upon. Will a country wising to access it be required to have an IMF programme if the amount is beyond a certain size, as is the case under the CMIM.

The Arab Monetary Fund agreement is even more ambitious, planning to set up a common central bank, currency and monetary policy. But this has repeatedly been postponed.

There are a number of problems that will need to be resolved before monetary cooperation can move ahead. Two important issues, which are also weaknesses in the current international monetary system, are the question of moral hazard and asymmetries in the process of adjustment.

How can it be ensured that the borrowing country undertakes measures to resolve its problem and so can repay the loans. But this question of ability to repay is tied to whether it is only the responsibility of the country borrowing because of its balance of payments deficit and what is the role of the surplus country. In the current system the responsibility for adjustment is solely that of the deficit country. But since the balance of payments is the result of actions of both surplus and deficit countries a country cannot correct its deficit unless the surplus countries are willing to see their surpluses disappear. How can the responsibility for adjustment be made into a joint one? Unless these questions are resolved reserve pooling will remain limited. Lack of opportunity and failure to reach agreement on such issues have resulted in the Chang Mai Initiative among East Asian not being used. The Surveillance Unit set up under CMIM can be an important unit to warn about increasing imbalances and also monitor adjustment. But as yet it has not been very effective.

Reserve pooling would be a giant step forward in international economic governance. However, prospects for it remain limited.

Chapter IV Challenges ahead

This process of expanding SSEC can be further fostered by bound mutual preferences among southern countries, more joint projects for technology development, greater student exchanges, tax preferences towards South-South FDI, and intra-South financial transfers to facilitate preferential trade and economic cooperation agreements for mutual benefit. Broad cooperation among developing countries would avoid some of the inefficiencies likely to accompany the current ad hoc proliferation of bilateral and regional preferential trading arrangements.

Trade among developing countries can be expanded through tariff preferences since tariffs remain much higher than in developed countries. Average tariff rates levied on primary products are 15.0% by low income countries and 11.3% by middle income countries and on manufactured products are 12.3% and 8.1% by low income and high income countries respectively. Average tariffs levied on South-South Trade are 11.1 percent (Przemyslaw Kowalski and Ben Shepherd South-South Trade in Goods, OECD Trade Policy Papers No. 40 2006). Also, often tariffs are higher on goods in which developing countries specialize. These tariff rates clearly provide scope for negotiated preferential tariff cuts. Furthermore, non-tariff barriers can be substantial. Distance is a more important barrier to South-South trade than to North-North Trade. Where a 10 percent increase in distance reduces North-North Trade by about 10 percent it reduces SST by 17 percent. SST involving low income countries has generally grown more slowly than SST involving Upper and Lower Middle Income Countries (Kowalski and Shepherd, 2006). Sixty eight percent of gains in Asia, 45 % in LAC and 39% in SSA from liberalization are from intra regional trade. Significant benefits have been reaped by some developing countries through joint trade facilitation studies and agreements.

Instead of following the route of bilateral trading developing countries should adopt a more broad based approach. A substantial hurdle to enhanced SST as shown by negotiations for the GSTP is to reach agreement among so many disparate countries. But SST could grow sequentially. India and China both have an agreement with ASEAN. One way, and may be the easiest, is to build on PTAs in Asia, many of which are built around countries in ASEAN. At the beginning of 2013, 109 FTAs among Asian countries had been notified to the WTO as compared to 36 in 2002. Most are bilateral. Another 148 are being negotiated of which three-quarters are bilateral. Most involve the members of ASEAN+6. Consolidation of these FTAs could be the basis of providing an impetus to SST (ADB March 2013 Asian Economic Integration Monitor). Similarly there is MERCOSUR. The next step might be to negotiate an agreement with MERCOSUR. The process of integration could be furthered if ceratin criteria could be developed and any countries fulfilling those criteria could join the group. . Such an approach would mirror the open regionalism structure of the Asia-Pacific Economic Cooperation (APEC). Or, alternatively, BRICS could provide the basis around which preferences could be built. The BRICS countries could form a preferential trading agreement and allow other developing countries to join this agreement. This would obviate the need for negotiations among many different countries.

The opportunity to foster the growth of SST through explicit bound Southern preferences might involve the creation of a new Southern trade organization where members commit to preferences to each other. Anti-dumping and countervailing duty procedures could be altered to reduce their use as non-tariff barriers. The dispute settlement procedure could be improved. Though the one in place now at the WTO is better than the earlier one at the GATT it still does not provide sufficient recourse to smaller countries. Antigua has won its case on internet gambling against

the US. But the US didn't to change its policy. Under WTO rules the only recourse Antigua has is to raise tariffs against US goods; but this would hurt Antigua more than the US.

An important hurdle in reaching an agreement would likely be the perception of sharply unequal benefits to individual countries. China, for instance, as a dynamic exporter of manufactures world be seen as a large beneficiary, as would, especially regionally, India and Brazil. The relevant policy question is what can be done to encourage trade among SSA countries and between SSA and Latin America and between SSA and MNA.

One way that benefits might be widely distributed would be through a system of financial transfers agreed on when a country joins the system of preferences. These might take the form of an upper bound of any tariff revenues lost from the Southern preferences, and would be negotiated as a one off side payment on accession to the scheme rather than an annual recurring renegotiated amount. Or an alternative is to follow the EU route. Large sums were provided to Ireland to help its development. A mixture of loans and FDI could be provided to the lesser developed countries to encourage them to join a trade agreement.

It should also be recognized that development takes time. Starting at the bottom of a value chain does not condemn one to remain there.

Trade can be fostered among developing countries by removing non-tariff barriers also. Lack of information and complex procedures and documentation can be serious barriers to trade. Improvement in procedures can reduce trade related costs by almost 14.5 percent in low income countries, 15.5 percent in lower middle income countries and 13.2 percent in upper middle income countries (Evdokia Mosie and Silvia Sorescu trade Facilitation Indicators : The Potential Impact of Trade Facilitation on Developing Countries trade, OECD Trade Policy papers No. 144m, 2013). For low income countries the most significant reducer of costs is harmonization and simplification of documents and for the middle income countries it is the streamlining of

procedures. Impartiality of government procedures and appeal processes is also important. As noted above capital flows among developing countries have been increasing. Such flows could be enhanced through provision of tax preferences. FDI might be particularly important for producing goods more appropriate to demand in developing countries. There is now also considerable scope for fruitful cooperation in technology transfer. This could be in the form of preferences in partial or full exemption from intellectual property arrangements or subsidization of licensing. Such a broad cooperation agreement covering trade, FDI flows and technology development will help spread the benefits from SSEC more broadly and help sustain growth in developing countries. But, obviously, negotiating such an agreement will be politically challenging. But as can be seen there are already embryonic structures which can be built upon, such as the PTAs centred around ASEAN, the decisions at the last BRICS summit to establish a South Bank and a Contingency Reserve Arrangement and the establishment of the CMIM.

Chapter V Conclusion: Future Research Agenda

The main pitfall to SSEC is to fail to reach agreement because of differing perceptions of how the gains from SSEC would be distributed . But adopting an approach akin to open regionalism avoids this problem. Countries that expect to benefit would join the scheme and those who do not expect need not join. This is also true of providing tax preferences for FDI or participating in joint research projects or providing preferential entry to students from developing countries.

The main challenges are in the areas of financial and monetary cooperation. Given the wariness of developing countries in issuing bonds or borrowing from banks how can the surplus savings of some countries be transferred for investment in savings deficit countries? The attempt by BRICS to develop a South Bank is a step in the right direction. Further studies need to be conducted to see how financial transactions can occur without creating the potential for destabilizing withdrawals.

Further research is also needed in the area of monetary cooperation. How can the reserves of developing countries be pooled keeping in mind the twin issues of moral hazard and ensuring symmetry of adjustment between deficit and surplus countries. Developing countries are becoming more important in providing assistance to fellow developing countries. A distinctive feature of such assistance has been the avoidance of conditionality. This ensures that the recipient country has the ownership of the action and is committed to ensure its success. But as yet there has been no evaluation of whether this approach has been successful, and if so, to what extent, and whether performance can be improved. This is an area which requires research to improve effectiveness of the partnership between Southern countries.

The major institutions involved in international economic governance were established in the aftermath of the Second World War and the developed countries play a major role in their establishment and governance structures. Improving their effectiveness requires increasing the voice of developing countries in these institutions. But at the moment the effectiveness of these institutions is severely curtailed. An extreme example is the stalemate in the Doha Rod of multilateral trade negotiations under the aegis of the WTO. The effectiveness of the IMF had been severely eroded before the 2008 financial crisis. Countries were not borrowing so the earnings of the IMF were insufficient and staff and activities had to be retrenched. Such a situation could recur once the current crisis is over. There is a perception that neither the developing countries nor the developed countries can reform these institutions on their own terms. Research is needed on what reforms may be possible and the process by which these reforms may be reached, so that SSEC can be harnessed to improve international economic governance.

An important aspect of reform of international governance will need to cover establishment of institutions to oversee SSEC. What should be their governance structure. A body with full representation such as the General Assembly obviously meets the challenge of being democratic but may lack effectiveness. There may be ned for another body such as the Security Council to ensure effectiveness. Research is needed to see what structural and governance options are there. If a limited body such as the Security Council is to be established how should its membership selected.

These are all important research questions answer to which are critical in order to further SSEC.