



International Trade Administration Commission of South Africa

SOUTH AFRICA TRADE REPORT 2014

**Trade as a driver of structural change for
sustainable development**

What is the South Africa Trade Report?

The South Africa Trade Report is an annual publication that aims to deepen understanding about trends in trade and trade policy issues, as they pertain to economic development.

Using this report

The 2014 South Africa Trade Report focuses on the role of trade in driving structural change for sustainable economic development. It does so in the context of South Africa's trade performance, as well as the composition and performance of its exports at the product and/or sector level.

Find out more

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Introduction

This is the first edition of the South Africa Trade Report 2014. The Report underlines the critical role of trade in driving structural transformation for sustainable economic growth and employment, and reaffirms the commitment of ITAC to fulfil its mandates in support of this effort.

Since the onset of the financial crisis in 2008, South Africa's growth has lagged, aggravating the country's structural problems of high unemployment and inequality. Government adopted the National Development Plan (NDP) in 2012 to address these challenges. The NDP, together with New Growth Path (NGP), the Industrial Policy Action Plan (IPAP) and South Africa Trade Policy and Strategy Framework (SATPSF) acknowledges that sustained growth and job creation requires structural change or the ability of the economy to constantly generate new fast-growing activities characterised by higher value added and productivity and increasing returns to scale, as also reflected in South Africa's current industrial policy.

International trade promotes structural transformation through demand-side effects including expanding the size and scope of local business, which do not need to rely on the domestic market to grow further. Supply side effects include the potential for replacing imports as local producers capture market initially served by imports, thereby exposing local firms to foreign competition and technology, which may lead to significant productivity gains. This has been the experience of developing countries, in particular the so-called Asian Tigers, which have achieved a mature stage of economic and social development.

Recognising the importance of trade in driving structural change for sustainable development, The South Africa Trade Report 2014 monitors and evaluates the country's trade flows, looking at whether the necessary structural change or new trade patterns have emerged, and if not, why, where South Africa's trade

performance could be improved and where the greatest benefits from trade can be reaped.

One of the key findings of this report is that there is only a limited number of manufactured products that the country can prioritise to increase the pace of transformation. South Africa needs to create trading advantages in order to accelerate growth and transformation, and to achieve this, the country requires both economies of scale and learning as well as a strategic approach to trade policy and a close link between trade and industrial policies. Gaining market access depends not only on flows of Foreign Direct Investment (FDI) but even more so on local firms emerging successfully from an expanding domestic market and connecting with regional and global value chains.

Also, sequencing and timing issues are fundamental to successful outcomes. Structural transformation advances by means of both creative and destructive forces that inevitably produce surprises, create tensions, trigger conflicts and generate trade-offs. Managing this process effectively requires the country to engage in a certain amount of experimentation in seeking the configuration of institutions and policies that will work best in its national conditions and accommodates the necessary transitions and adaptations.

ITAC looks forward to seeing this report become a key component in the development debate.

Executive summary

Trade as a driver of structural change for sustainable development

The South Africa Trade Report 2014 examines the role of trade in driving structural transformation for sustainable economic growth and employment in the context of South Africa's trade performance, as well as the composition and performance of its exports. It is split into seven chapters.

Trade, structural change and economic development

The Report starts with a comparative analysis of East Asia and Latin America in an attempt to illustrate how trade policy and trade-related structural change in both regions have contributed to the differences in growth and employment (see **Chapter 1**). The contrasting experiences of both regions provide useful explanations as to why the benefits of trade opening differ among countries. Below are some of the salient differences and similarities between the two regions:

- Structural change in manufacturing was more pronounced in East Asia than in Latin America. Increases in exports in medium and high-tech sectors led to large increase in share in manufacturing value added and employment in the same sectors in East Asia.
- As a result, East Asia has been more successful in diversifying its exports and creating new dynamic comparative advantages in high value added products, compared to Latin America which has remained highly specialised in commodities and resource-intensive manufactures.
- Both Latin America and East Asia have opened their markets and reduced tariffs (although this was

much faster in the former) achieving comparable levels of protection.

- Despite higher tariffs, East Asian economies have more successfully integrated into the global economy than Latin American economies as measured in trade as a proportion of GDP.
- As a result of significant growth in R&D expenditure in Asia, the region has achieved a greater number of patents granted and increased the share of engineering industries in manufactured value added relative to Latin America.

Hence, structural change is the key to significant and sustained growth, and opening up a country to international trade in itself does not (has not) lead to such structural change. The relative success that East Asia has achieved in terms of export growth and structural change is a reflection of the greater success in the evolution of its comparative advantage and in the ability of its industries to adjust to trade reforms. In contrast, Latin America specialized according to its static comparative advantages in sectors that offered fewer opportunities for diversification and improvements in product quality. The latter illustrated that the technological gap widened in relation with the dynamic Asian economies. The East Asian region demonstrated a pronounced complementarity between the government's consistently proactive policies to attract FDI and coherent and equally proactive policies in support of the development of local firms' capabilities.

Three important lessons are to be drawn from the East Asian experience:

- First is that above and beyond the fact that different branches of production have different capacities

for leading the way to gains in productivity, in today's developing countries the key to robust growth is the synchronisation of export development, production linkages and technological capacity building.

- Second, gaining market access is very challenging. It depends not only on flows of FDI but mostly on local firms emerging successfully from an expanding domestic market and connecting with regional and global value chains.
- Third is in relation to the diversity of experiences. The selection and implementation of policies varied enormously and was highly dependent on the conditions facing each of the East Asian governments. Countries will therefore have to focus their scarce resources on selected areas, discover the binding constraints in each area, apply policies to remove these constraints, and proactively develop competitive value chains and clusters in the industries where they have a comparative advantage in resource-based, labour-intensive manufacturing.

Benchmarking South Africa's trade

Recognising that the potential role of trade in accelerating growth and employment depends on whether it has in itself induced the necessary structural changes in the economy, in **Chapter 2** we ask whether South Africa's economy is relatively open, and if so, to what extent has it engendered structural transformation. In this chapter we assess the impact of trade liberalisation on South Africa by simply tracking trade trends, looking at whether the necessary structural change or new trade pattern has emerged, and if not, why; identifying where South Africa trade performance could be improved and determining where the greatest benefits from trade can be reaped.

Evidence shows that South Africa's widened exposure to the rest of the world has not in itself induced the necessary structural changes in the economy to significantly alter the export basket beyond the range of products that

reflect South Africa's static comparative advantage. The RCA indices are still highest for mineral products. Unless an effort to deepen specialisation is mustered, and over-reliance on traditional goods is tempered, the pace of structural change and industrialisation will remain slow, and the country will remain overexposed to trade shocks, and the inequality generating forces of international asymmetries will not be tamed.

The country needs to build its industrial development strategies around developing its relative advantages. We observe that some of the products in which it has comparative disadvantages are among the top exports, calling for synergies between industrial policy and trade.

We also observe that many South African value-added exports are destined exclusively to their neighbours rather than towards developed countries. Thus, the integration of the national market in Africa can help the country hasten its structural transformation and seize opportunities to advance on industrial development.

Impact of BRIC's expanding consumption on SA trade

The last two decades have seen an important change in the global economic landscape, a shift in wealth, led by China, India, Brazil and Russia (often referred to as BRIC). These economies are among the world's top 10 largest middle class consumers, with over US\$ 25 trillion projected to be spent by 2030 (Kharas, 2011). In 2010, South Africa was invited to join the group, which was then referred to as BRICS. This relationship has the potential of becoming a key source of economic transformation and sustainable development if monitored closely to ensure that the country makes the most of the benefits stemming from it. Hence in **Chapter 3**, we consider some of the products and markets the country can take on so as to maximise the opportunities or potential gains inherent in BRIC's trade. Evidence points to the following key findings:

China (and to a lesser extent India) has become an important trading partner for South Africa. However, China's exports to South

Africa and the rest of the continent compete with the domestic manufacturing sector. On the other hand, trade with Brazil falls short of the deemed potential and is quite negligible; yet the composition of exports to the country is mainly in more value-added manufactured goods. Minerals beneficiation is an important element for structural transformation and the industrialisation of South Africa. It will ensure that more value is added to domestic mineral products before exporting them.

Having said that, South Africa needs to boost exports in those products that are in demand in which it has gained more comparative advantage. Such products include miscellaneous chemicals (with respect to Brazil); salt, sulphur, etc. (Russia) and tanning, dyeing, etc. (India).

In addition, the country can also raise its competitiveness, particularly in those manufactured products which are in demand but in which it is losing or has lost comparative advantage, such as impregnated or coated textile fabric (with respect to Brazil); optical, photos, medical apparatus, residues etc., and photographic or cinematographic goods (Russia); pulp of paper, paper and paperboard and explosives (India) and tobacco, tanning and fish, crustaceans etc. (China).

Attractiveness of EU, US and Japan markets

The collapse of Lehman Brothers in September 2008 triggered a synchronised recession in advanced economies, a sharp decline in global trade and manufacturing and a sovereign debt crisis in highly indebted Eurozone countries. Recovery remains sluggish and risks for the near future are still high. This has a negative impact on South Africa. Hence, the extent to which South Africa mitigates the effects of the economic slow recovery depends on how well it positions itself against future risks. **Chapter 4** analyses South Africa's trade with its traditional partners, the EU, US and Japan to identify what shape future demand from these regions will take, and where the greatest benefits can be reaped.

Indeed, South Africa's trade with the EU, US and Japan has been performing below its potential, owing to a slow recovery in these economies. Consequently, the manufactured products that South Africa needs to prioritise to increase the pace of transformation are very limited. However, the anticipated stronger recovery over the period ahead presents new opportunities to increase exports, provided that the country can raise competitiveness, particularly in those manufactured products which are in demand but in which it is losing or has lost comparative advantage. Such products include furniture, beverages (mainly wine), paper and paperboard and tools (with respect to the EU) and beverages (mainly wine), clothing and textile, miscellaneous chemicals, works of art, carpets, essential oils and fish, crustaceans, etc. (US).

The country can also boost exports in those products that are in demand in which it has gained more comparative advantage, such as vehicles, organic chemicals and pulp of paper (with respect to the EU) and pulp of paper and explosives (US). Unfortunately, the demand for most of the South Africa's manufactured exports to Japan has contracted. But given the stronger economic growth projection over the coming years, the country can look to increase exports to Japan in vehicles, cereals and wood products.

Focus on Africa

South Africa's economic prospects have become increasingly intertwined with those of the rest of the African continent, which is forecast to remain the second fastest growing region. Evidence has shown that the number of middle-class households in 10 Sub-Saharan African countries: Angola, Ethiopia, Ghana, Kenya, Mozambique, Nigeria, South Sudan, Sudan, Tanzania and Uganda are expected to boom in the next 16 years from 15 million in 2014 to over 40-million by 2030 (Standard Bank, 2014). The growing number of relatively wealthy consumers in Sub-Saharan Africa will become a key source of demand for South African goods. Hence in **Chapter 5**, we consider some of the products and regional markets the country can take on so as to maximise the opportunities inherent in Africa's trade.

South Africa's trade with the rest of Africa has increased dramatically than with the rest of the world, and most of such trade is in manufactures, affording a substantial market for value-added goods and opportunity to accelerate the pace of transformation.

To maximise opportunities inherent in Africa, South Africa needs to boost exports in those products that are in demand in which it has gained more comparative advantage. Such products include salt, sulphur, etc., cereal, flour, starch etc., coffee (for SADC); soaps, plastics, photographic or cinematographic goods, tanning, albuminoids, machinery and milling products (ECOWAS); salt, sulphur etc., albuminoids, machinery and headgear and parts (COMESA) and explosives, vehicles, inorganic chemicals and cocoa (EAC).

In addition, the country can also raise its competitiveness, particularly in those manufactured products which are in demand but in which it is losing or has lost comparative advantage, such as inorganic chemicals, printed books, cereals, fertilizers, and sugars and sugar confectionary (with respect to SADC); rubber, headgear and parts, tools, paper and paperboard, furniture and explosives (ECOWAS); fertilizers, printed books (COMESA) and miscellaneous chemicals, tanning, dyeing etc., printed books, plastics, fertilizers and aircraft, spacecraft etc. (EAC).

Trade outlook

In **Chapter 6** we use the growth and trade forecast provided by the World Economic Outlook to discuss the general trade outlook, taking into account the growth trajectory of the world economy and the different trading partners which we discussed in chapters 3 to 5. This will give an indication of South Africa's future trade prospects and to some extent what might be required of South Africa to change the structure of its trade.

South Africa's exports will grow at the rate of 4.7 per cent per in 2015. This growth in South Africa's exports will mostly be driven by Africa (1.3 per cent), the EU (0.9 per cent) and

China (0.5 per cent). Less than 0.4 per cent of this export growth will be driven by exports to Brazil and Russia. This means that Africa, the EU and China will be the regions or countries that will continue to drive South Africa's future export growth. The growth outlook of these countries is therefore particularly important to South Africa. In the world economy these countries contribute about 38 per cent of total output and their growth can translate into massive demand for South Africa export products.

By comparison, South Africa's imports are expected to grow at an average of 4.3 per cent in 2015. The largest source of South African imports is the European Union followed by China and then Africa. Hence, the forecast growth in imports by the country would be driven mostly by these countries. Brazil and Russia are generally an insignificant source of imports for South Africa.

Chapter 1

Trade, structural change and economic development

There is a shared sense that international trade has a strong potential to contribute to growth and poverty reduction. There are several examples of countries in which integration into the world economy was followed by strong growth and a reduction of poverty, but evidence also indicates that trade opening does not automatically engender growth. The question therefore arises, why the effects of international trade have been so different among countries of the world.

Winters et al. (2004) and Harrison and McMillan (2006) review the literature on trade and poverty, and on globalisation and poverty, respectively; while Goldberg and Pavnick (2007b) survey the studies on trade and inequality. Evidence suggests that trade opening is unlikely to produce beneficial results across all countries or households. Other studies claim that full liberalisation of trade in goods could have significant negative effects on Least Developed Countries (LDCs) in terms of production and employment (George, 2010), particularly when it has not in itself induced the necessary structural changes in the economy (UNCTAD, 2002; 2004; 2006; UNIDO, 2013).

In the words of Justin Lin (2012), all countries that remain poor have been unable to diversify away from agriculture and the production of traditional goods into manufacturing and other modern activities. Ocampo and Taylor (1998) add that an increase of trade openness is a growth opportunity for a country only if local resources can be deployed in adequate quantities to produce goods for the external market. Domestic production capabilities have to be already in place in order to respond to international competition, improve technology and exploit trade opportunities from increased liberalisation.

Structural change based on trade openness – that is change in the sectoral composition of

output and in the sectoral pattern of employment as the economy develops and opens – emerges a vital feature of the development process and an essential factor in explaining the rate and pattern of growth (McMillan and Rodrik, 2011). It can deter growth if its pace is too slow or its direction is inefficient (growth-reducing structural change) but can contribute to growth if it improves the allocation of resources across sectors from low-productivity to more productivity sectors and activities (growth-enhancing structural change). Hence, the pace and pattern with which this structural change takes place is the key factor that differentiates successful countries from unsuccessful ones.

There are four ways identified in the literature in which trade openness can drive structural change. First, the increase in revenues from trade integration induces exporters to upgrade technology (Bustos, 2011). Second, it exposes firms to forms of competition not present in the domestic market, provoking the reallocation of resources towards more productive uses (and enhances allocative efficiency). Third, it improves quality and raises productivity as foreign suppliers exert pressure over domestic suppliers (Weiss, 2005). Fourth, it provides access to advanced capital equipment and R&D. A country which gains access to capital goods is able to accumulate more capital compared to autarky, because this access raises output per worker and thus learning by doing (Goh et al, (2002).

The contrasting experiences of East Asia and Latin America provide useful explanations as to why the pattern of trade-induced structural transformation differs among countries. While East Asia has become one of the most successful industrialised economies, aided by liberalisation, Latin America has seen de-industrialisation and growth-reducing structural change despite significant liberalisation efforts. The East Asian Tigers

were able to transform opportunities coming from the global market into structural change-driven industrialisation with the help of sophisticated industrial policies.

Moreover, beyond the set of rules that determine the overall trade policy structures, the broad macroeconomic environment also plays a crucial role in explaining how globalisation affects economic performance. The rules that allow or restrict the mobility of trade and capital, the choice of an exchange rate regime, and the institutional fundamentals of economic performance (i.e. governance), will all affect the different channels or mechanisms through which trade is expected to impact on welfare, that is, the effects on poverty within countries.

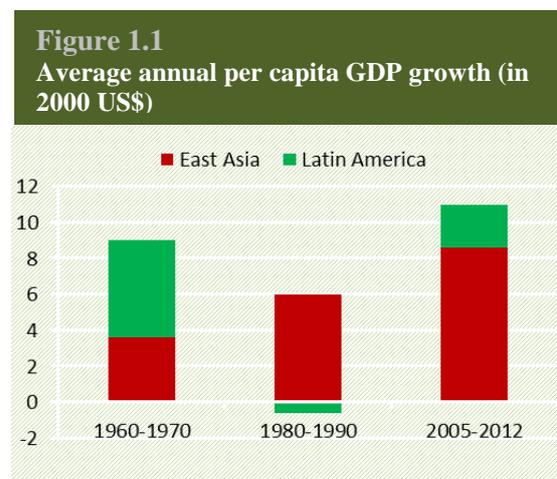
In this chapter, we carry out a comparative analysis of East Asia and Latin America in an attempt to illustrate how trade policy and trade-related structural change in both regions have contributed to the differences in growth and employment. One important phenomenon in economic development is the divergence of performances among developing countries in both regions in recent decades. The comparison of the two economies seems to be, therefore, rich in lessons for any country in Sub-Saharan Africa.

Patterns of growth, structural change and employment

In the 1960s, Latin America was the most developed region outside the industrial countries, with an average level of real GDP per capita more than 1.5 times that of East Asia. Twenty years later (1980-1990), this relative position had been reversed: real GDP per capita of the East Asian region had more than doubled, while that of Latin America had actually dwindled. The difference even continued in recent years (see Figure 1.1).

While several factors contributed to the divergence in growth performance in these two regions (such as high rates of fixed investment and savings, among others); differential patterns of structural change account for the bulk of the difference in regional growth rates. This can be seen by looking at the respective contributions of agriculture, non-manufacturing industry, manufacturing and

services sectors to Gross Domestic Product (GDP) at different points in time presented in figure 1.2.



Source: World Bank



Note: AG is agricultural sector, NMI is non manufacturing industry (comprises of mainly mining), MAN is manufacturing, and SER is services (comprises of trade, transport, communication and others)
Source: UN statistics

Typically most attention is paid to the size of the manufacturing sector as economic development is often thought to be closely associated with industrialization (Lewis, 1954). Two important patterns emerge from Figure 1.2. First, rapid GDP per capita growth between 1960 and 1970 witnessed in Latin America and Caribbean was accompanied by structural change away from agriculture to manufacturing and services sectors. However, the pace of structural change slowed afterwards following a shift in production structure towards services, with manufacturing share in value added declined from 23 per cent

in 1960-1970 to 17 per cent in 2005-2012, pointing to deindustrialisation.

On the contrary, the shift of resources from agriculture to manufacturing entails static and dynamic structural gains in East Asia. Between 1960 and 1970, the agriculture sector accounted for 26 per cent of GDP, and manufacturing for 12 per cent. By 2012, agriculture accounted for only 10 per cent of GDP and manufacturing doubled.

As resources moved from traditional activities to new ones, so did labour, leading to some productivity gains in East Asia (Table 1.1). This contrasts with the pattern observed in Latin America, where workers who moved out of agriculture were mainly absorbed in the (formal and informal) services sector. The agricultural employment share fell from 47 per cent in 1960 to 14 per cent in 2010. At the same time, services expanded from 32 to 64 per cent of the total workforce. Disaggregating the services sector suggests that the biggest employment expansion occurs in trade and distribution services, although other community, personal and household services expanded rapidly as well.

Table 1.1
Employment share, 1960-2010

Region		1960	1975	1990	2010
East Asia	AG	48	43	32	21
	NMI	4	5	7	8
	MAN	15	18	19	15
	SER	33	34	42	56
Latin America and Caribbean	AG	47	34	25	14
	NMI	7	9	9	10
	MAN	14	15	15	12
	SER	32	42	51	64

Source: Groningen Growth and Development Centre (GGDC)

A comparison of sector shares in Figure 1.2 and Table 1.1 gives an indication of relative productivity differences across sectors (Table 1.2). Both regions made negative contributions with regards to the ‘cross’ term. In other words, there was huge negative productivity growth “across” sectors. The negative effect is so strong in Latin America (1.04 percentage points) to the extent that it offsets to a large extent the small “within” effect (0.93 percentage points), reducing overall labour productivity in Latin America. Asia is the only

region where the contribution of structural change is positive (-0.06+3.08 = 3.02 percentage points).

Table 1.2
Decomposition of productivity growth, 1990-2010
(percentage points)

Region		Labour productivity growth	Component due to		
			Within	Between	Cross
East Asia	Total economy	3.64	3.08	0.62	-0.06
	AG		0.43	0.00	0.00
	NMI		0.32	0.07	-0.03
	MAN		1.27	0.04	0.12
	SER		1.06	0.51	-0.15
Latin America and Caribbean	Total economy	0.93	1.05	0.93	-1.04
	AG		0.34	0.00	0.00
	NMI		0.28	0.30	-0.25
	MAN		0.46	0.03	-0.05
	SER		-0.04	0.59	-0.75

Source: Adapted from Timmer et al 2014

The current employment reallocation pattern in Latin America strikingly differs from that in earlier periods. In particular, during the 1960s and early 1970s, the region took a step forward by expanding its manufacturing activities. This was related to growth enhancing structural change. In contrast, after 1990 market services activities such as retail trade and distribution services expanded. Nonetheless, the latter had productivity growth below that of manufacturing. Unlike manufacturing, the large negative ‘cross’ term of services (0.75 percentage points) could not be offset by yet the negative ‘within’ effect (0.04 percentage points), reducing the overall productivity growth in services sector. The overall effect was static reallocation gains but dynamic losses, pointing to a limited role for structural change post 1990.

To gain further insight into the discussion, we look at the sectoral details for specific countries in both regions (measured as percentage shares of real value added of the manufacturing industry, data taken from UNIDO INDSTAT). This reflects the evolution of industrial specialisation patterns over time. Among Asian countries, Japan represents the first mover in the industrialisation process. Structural changes in the Japanese industry have been consistent over the period under review. Machinery, electronics, telecommunication and transport and equipment have progressively emerged as the main specialisation sectors at the expense of all traditional production (see Figure 1.3).

Figure 1.3
Japan: Structure of the manufacturing industry

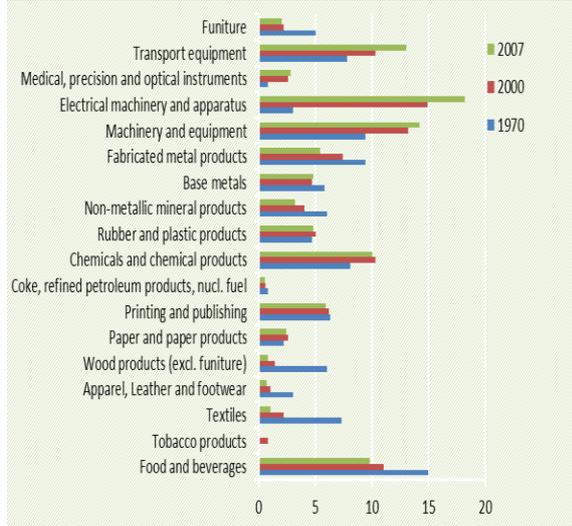


Figure 1.5
Korea Rep. of: Structure of the manufacturing industry

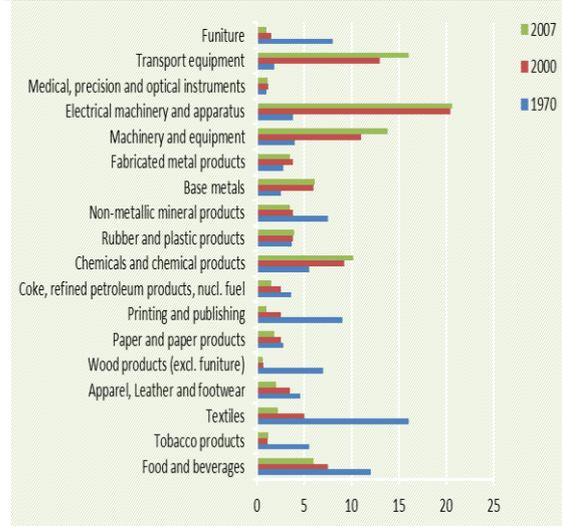


Figure 1.4
China: Structure of the manufacturing industry

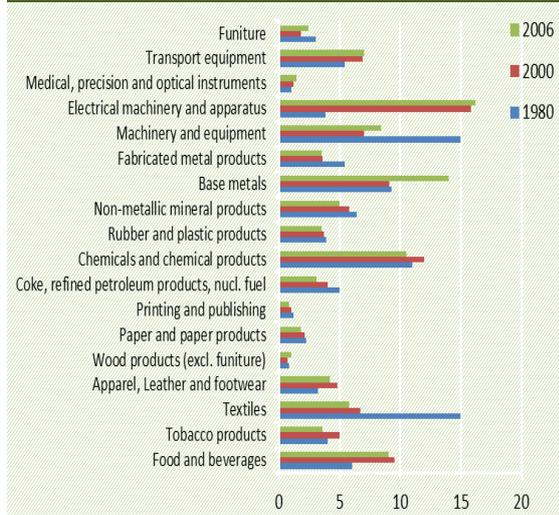
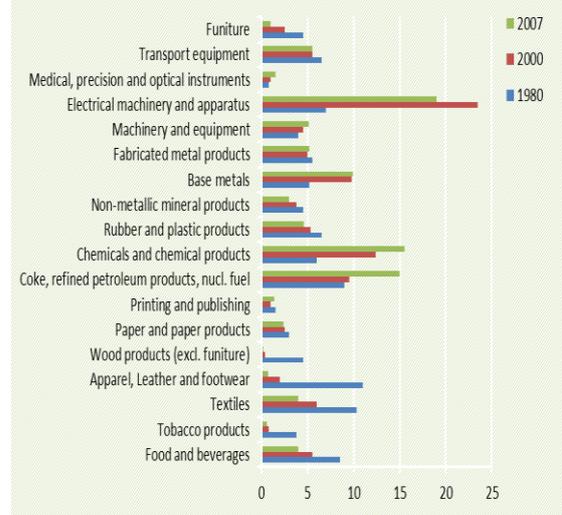


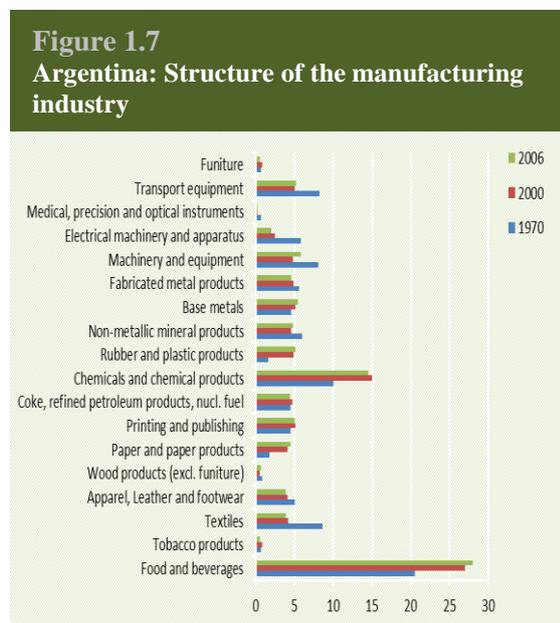
Figure 1.6
Taiwan: Structure of the manufacturing industry



China represents the most striking phenomenon in the Asian region, being one of the largest manufacturing producers in the world and currently making up for around 16 per cent of world value added. Its industrial structure is characterised by a strong decline of textile and other traditional industries and the “heavy” industries producing metals and machinery, to the advantage of the electrical and telecommunication industry, transport equipment, food and beverages, apparel, leather and furniture (see Figure 1.4).

The Republic of Korea exhibited a similar pattern to Japan (see Figure 1.5). Its economy has gradually intensified its specialisation in machinery, electronics, telecommunication and transport and equipment at the expense of traditional sectors. But textiles, apparel, leather and footwear remain less important for the economy. At the same time, the Taiwanese industrial structure was dominated by the rise of electronics, but significant specialisation is strengthened in basic metals, chemical and petrochemical products (figure 1.6).

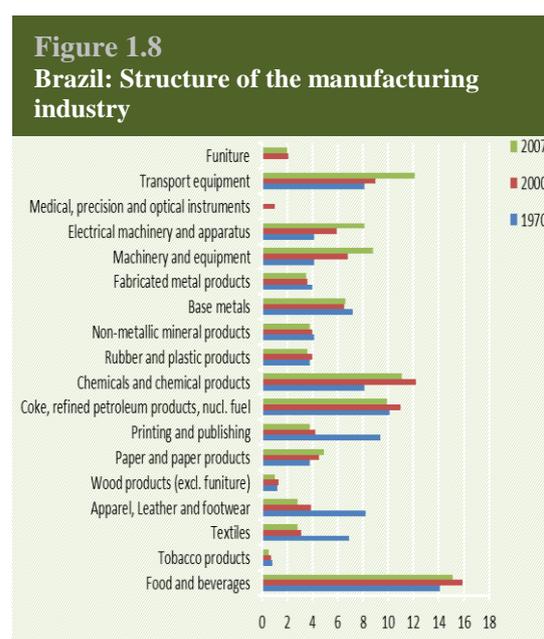
Unlike Asia, the Latin American countries have witnessed little or no structural change and increased the weight of consumer-goods industries rather than industrial-goods industries. Figure 1.7 and Figure 1.8 present results for the two largest countries in this region (Argentina and Brazil).



The structure of the manufacturing industry in Argentina is fairly concentrated in a small number of activities. Food and beverages and chemicals still emerge as the most important ones at the expense of most modern industries.

Comparing the structure of the Brazilian manufacturing economy, with our sample average, petrochemicals and, to a lesser extent, the apparel, leather and footwear industries emerge as sectors of relative specialisation over the period under review, only machinery, ICT and transport and equipment have continued to expand at the expense of all other industries.

On balance, Brazil, Argentina – and many other Latin American countries – indicate growth-reducing role for structural change, as industrial structure changed towards resource-based sectors. In Asia, instead the major trend is the shift toward manufactures, reflecting growth-enhancing structural change. We observed some important modern industries whose productive capacities have been moved away from Latin American economies to benefit Asian countries.



Trade as a potential driver

The various aspects of structural change in production are linked to changes in trade. The rising role of many Asian countries in international trade reveals high industrial performance and trade-induced structural transformation. In the case of Latin America, this was explained by a greater propensity to export rather than an expansion of domestic manufacturing products.

A look at Table 1.3 and Figures 1.9–1.10 hints at a possible interrelationship between structural change, technological upgrading and export diversification. Since 1990 both regions have rapidly integrated into the world economy (measured as the ratio of the sum of exports and imports to GDP). The larger contribution of trade to economic growth in East Asia and China reflect the bigger expansion of trade compared to Latin America.

Table 1.3
Trade openness 1970-2006 (in per cent)

Region	Openness	1970	1980	1990	2000	2006	2012
Latin America	Trade/GDP	14.4	21.9	19.6	34.9	42.6	36.0
	Exports/GDP	6.9	10.3	10.9	17.4	23.2	17.4
East Asia	Trade/GDP	20.1	38.9	46.2	50.3	49.3	47.3
	Exports/GDP	8.9	20.3	22.7	25.3	26.1	23.9
China	Trade/GDP	3.2	19.4	36.0	38.7	69.9	46.3
	Exports/GDP	1.6	9.1	14.5	20.8	38.5	24.5

Source: World Bank

Latin America saw a drop in the relative weight of manufacturing in total production despite the increasing trade openness over time (see Figure 1.9). As a result, the share of its manufactures to total exports is 1.5 times lower on average than the corresponding figures in Asia (see Figure 1.10). The difference is even more pronounced when comparison is made with reference to the share in world manufactured exports. Asia emerges as one of the largest exporters of manufactures in the world, making up for about 17 per cent of world manufactured exports, compared to 5 per cent for Latin America in 2012.



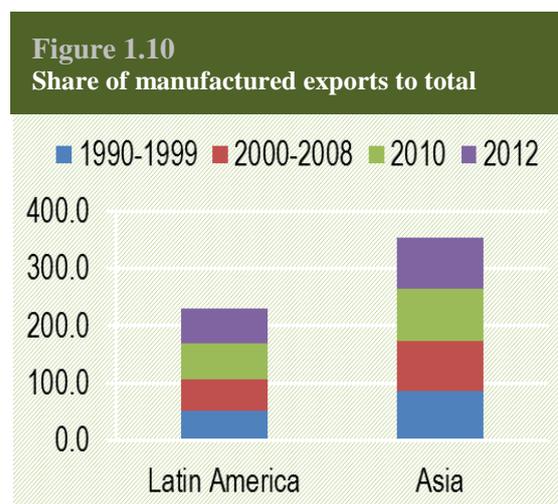
Source: COMTRADE, UNIDO database

China is leading manufacturing in Asia, having become the world's largest exporter in 2008. Its exports of manufactured goods grew on average by 22.1 per cent a year over 2002-2011, twice as fast as the world's rate of 10 per cent. The country improved its lead further, achieving a world market share of 16.6 per cent in 2011.

Within manufacturing, structural change takes place as diversification occurs. Lederman and Maloney (2007), Agosin (2007) and Hesse (2008) emphasize on the diversification of export basket as one of the important determinants of economic growth. Efforts to achieve diversification that departs from traditional comparative advantages can start the growth process. Countries that export products that are related to the export profile of high-income countries tend to converge quickly to these higher income levels and, therefore, grow faster. As such what a country

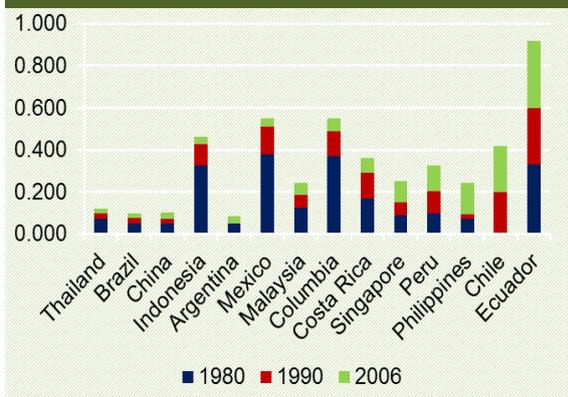
exports matter more than how much a country exports.

Export diversification spurs economic growth through two channels (Agosin, 2007). The first is the portfolio effect: when exports are more diversified, their earnings are less volatile and as a consequence the variance of economic growth is also lower. Second, there are dynamic effects associated with diversification, referring to increases in productivity when countries diversify their exports and output base. This process is associated with the accumulation of skills, learning by doing and externalities linked to the production of non-traded inputs. Together with higher rates of fixed investment, Agosin shows that more diversified exports explain most of the difference in economic growth between East Asia and Latin America.



Export diversification or concentration is measured here using the Herfindahl Hirschman index (HHI), and is calculated using a 5 digit breakdown of the Standard International Trade Classification (SITC, Rev.2). The lower the HHI, the less concentrated or more diversified exports are (see Appendix 1 for the formula). Figure 1.11 illustrates the results.

Figure 1.11
Export Diversification 1980-2006
(Hirschman Herfindahl Indices)



Source: COMTRADE, UNIDO database

Broadly, exports are more diversified in East-Asia compared to Latin America, although there are several exceptions. Levels of export diversification differ strongly among countries, and should be understood in the context of different characteristics of nations that reduce export concentration (e.g. per capita income, country size, share of manufactures in exports and trade opening – Klinger and Lederman 2006; Cadot et al, 2011) and others that have the opposite effect (e.g. natural resource endowments). These factors seem to explain relatively well the positions of countries at the low-end and high-end of export concentration (Figure 1.11). That is, the largest economies in the two regions, China and Brazil, are also the most diversified. In contrast, countries with large natural resource endowments, Ecuador and Chile (Latin American countries), have relatively concentrated exports. The relative position of the countries in between is more difficult to understand. For example, large industrial bases may have contributed to the diversification of Thailand, Mexico, Malaysia and Costa Rica, whereas the small share of manufactures in exports may explain the position of Colombia and Thailand.

In 9 out of 15 countries exports have become more diversified between 1980 and 2006, in line with increases in per capita income, trade liberalisation and an increasing role of manufactures in exports. The most important drop in concentration levels occurred during the 1980s, when many countries started to liberalise trade. The drops were particularly

important in Indonesia, Mexico and Colombia. In contrast, in the Philippines, Singapore, and Peru exports became more concentrated over time. In Singapore, the increase originates from a re-concentration of the country in particular areas of comparative advantage.

The less concentrated exports in East Asia compared to Latin America also result in part from better access to inputs for export production at world prices, a more competitive real exchange rate, and easier access to subsidised credit (Weiss, 2005).

Within manufactures, medium- and high-tech (MHT) products have the largest potential to increase growth and productivity. MHT products raise economic growth because they grow faster in international trade being highly income elastic, create new demand, and substitute faster for older products. They also offer more scope for incorporating new scientific knowledge, particularly product design. Over the last three decades, both regions have increased the share of high-tech exports of manufactures (see Figure 1.12). However, the structural change was more profound in East Asia compared to Latin America. By 2010-2012, the share of medium- and high-tech exports of manufactures was 10 times higher in East Asia compared to Latin America.

Figure 1.12
Technology composition of exports (US\$ billion)



Source: COMTRADE, UNIDO database

A regional breakdown by countries shows that of China's top 10 export manufactures in 2011 for example, 6 were high-tech products. They included, computer, telecommunication and

office equipment, diodes and transistors and optical instruments. Three other were medium-tech engineering products. Mexico and Brazil are the main drivers of the Latin America's exports. But of Mexico's top 10 export products in 2011, only two were high-tech manufactures (telecommunication and computer equipment) and five were medium-tech products (passenger and goods vehicles, and their parts, TV receivers, and electrical equipment. Brazil had only one high-tech exports (aircraft, 0.2 per cent of total exports), and no medium-tech products among its top 10 exports in 2011. It should be noted that being more of a resource-based country, Brazil concentrated its top 10 exports in 2011 in five primary products and four resource-based manufactures (iron ore, heavy petroleum oil, sugar and pulp) (see UNIDO 2013).

Regional production sharing played a key role in the technological upgrading of exports in East Asia. Ando et al (2006) find that intra-regional trade in manufacturing goods as a share of total trade increased considerably in the East Asian region. In this region, these goods increased their share in imports from 50 per cent to 70 per cent of imports, compared to 10 per cent in Latin America.

East-Asia has also been more successful than Latin America in creating new dynamic comparative advantages for its exports over time, with considerable spill-overs to economic growth (Table 1.4). This can be studied using the revealed comparative advantage (RCA) analysis framework proposed by Balassa (See Appendix 1). A number exceeding one shows that a country's share in world exports of a product is larger than its overall share in world exports.

In the 1960s and 70s, both Latin America and Asia had comparative advantages in products such as food, crude materials and animal and vegetable oils. Over time, Latin America has remained highly specialised in commodities and commodity intensive manufactures, as expected for a region with abundant natural resources, including petroleum, minerals and land. Some state that natural resources may have acted as a "curse" for the development of the region, as the high profitability of their exploitation, requiring little technology,

hindered the upgrading of its exports (Kuwayama and Durán, 2003).

Table 1.4
Revealed Comparative Advantage (RCA), 1980-2005

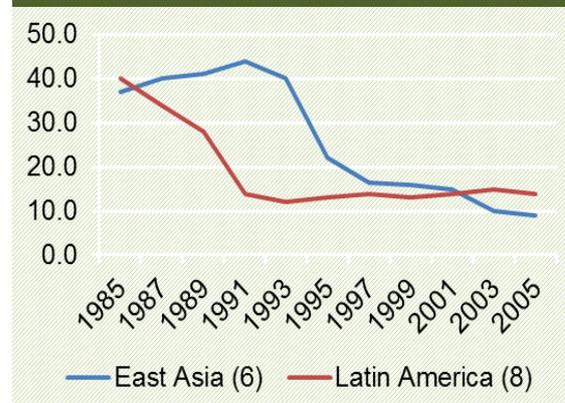
	Latin America (8)				East Asia (5)			
	1980	1990	2000	2005	1980	1990	2000	2005
Food and live animals	3.9	3.1	2.5	2.8	1.2	1.3	0.9	0.7
Beverages and tobacco	1.0	1.1	1.3	1.5	0.4	0.6	0.5	0.3
Crude materials, inedible	2.1	2.5	2.4	3.3	2.6	1.5	0.8	0.7
Mineral fuels, lubricants	0.7	2.0	0.9	1.2	1.7	2.0	0.8	0.7
Animal vegetable oils and fats	3.9	4.8	3.0	3.4	5.3	4.3	3.0	2.6
Chemicals	0.5	0.6	0.5	0.5	0.4	0.5	0.5	0.5
Manufactured goods	0.9	1.3	1.0	1.0	0.6	0.8	0.8	0.9
Machinery and transport	0.3	0.4	0.9	0.8	0.3	0.7	1.1	1.2
Misc. manufactured activities	0.4	0.4	0.8	0.7	0.9	1.4	1.7	1.7
Commodities not classified	0.3	0.4	0.3	0.1	2.7	1.2	0.3	0.3

Source: COMTRADE database, excluding China and Vietnam

The story of East-Asia is different, particularly since 2000: the region reduced its comparative advantage in foodstuffs and raw materials, while increasing substantially its advantages in manufactures.

The differences in the magnitude of the effects of trade on patterns of structural transformation as seen in value added may reflect the slow and selective trade liberalisation in Asia. While the general direction of trade reforms has been the same, the content, speed and magnitude of reforms differed greatly between East Asia and Latin America (see Figures 1.13).

Figure 1.13
Average applied tariffs (unweighted)



Source: UNCTAD and World Bank databases

While Asia had liberalised its trade regime at the margin, Latin America opened up its market relatively faster (also see Elson, 2006). Tariffs were initially lower in East Asia than in Latin America in the mid-1980s, but were cut more slowly in the late 1980s in the former than in the latter. As a matter of fact, 79 per cent of all structural adjustment loans of the World Bank with Latin American countries between 1982 and 1989 enforced trade liberalisation in the region (Edwards, 1995; Bora and Neufeld, 2001). Multilateral trade negotiations complemented trade liberalisation in Latin America, but in East Asia, most tariff cuts were realised after the Uruguay Round Multilateral negotiations since the mid-1990s. Moreover, several East Asian countries made further tariff cuts under the Information Technology Agreement in 1997.

What could be possibly driving this early and faster trade liberalisation in Latin America is its longer tradition of free trade agreements (FTAs) compared to Asia (ECLAC, 2007; and Kuwayana, Duran and Silva, 2005). In the late 1980s, Latin America began to pioneer preferential trade agreements and regional integration. Some countries have negotiated multiple extra-regional bilateral trade agreements (e.g. Chile and Mexico). In contrast, in East Asia, free trade agreements and regional integration are a more recent trend.

This suggests that import competition might have caused many industries in Latin America to contract and release labour to less productive activities while many import-competing activities have continued to receive support as new, export-oriented activities were developed in Asia.

Industrialisation lessons from East Asia

In the previous sections we noted that rapid economic growth and employment has typically occurred where most structural change has taken place and where manufacturing continues to play a substantial role in production such as East Asia. In this section, we explore the role played by technological change, industrial policy and institutions in successful East Asia (or unsuccessful Latin America) in manufacturing structural change.

Technological Change

Among the central issues in the literature on industrialization are technological change and innovation, and the relative contributions of multinational enterprises (through Foreign Direct Investment, FDI and Global Value Chains, GVCs) and from domestic investment in facilitating technological upgrading.

Technological progress and its diffusion or catch up resulted from lagging countries accessing technology developed in leading nations, adopting it effectively to local circumstances, and subsequently relying more on indigenous innovation. Multinational Enterprises (MNEs) can diffuse technologies to developing countries in three ways: (i) by directly transferring technology to affiliate or Joint Ventures; (ii) through spillover effects, and/or (iii) through doing R&D within a developing country (Lloyd 1996). FDI has been a major vehicle for the transfer of advanced foreign technology to developing countries for a long time (Fu, Petrobelli and Soete, 2010; Veloso and Soto 2001). Once sufficient absorptive capacities have developed, MNEs can bring technology and know-how to a local economy through the above mentioned ways. This makes MNEs the main engines of innovation in the world economy (Franco et al, 2011).

Recently, apart from the technology transfer role of MNEs and FDI, the global fragmentation of production has also contributed to industrialization as a result of the greater ease through which parts of a product's manufacturing may be outsourced and located in various countries (Nixon, 2012), otherwise known as Global Value Chains (GVCs). The emergence of GVCs has been driven by better transport and freight handling, and the liberalization of trade, as well as improvements in information and communication technologies (Baldwin, 2003).

MNEs used these better technologies and transport mechanisms to separate their production processes across the globe, described as 'spatial disintegration' of production (Fenster, 1998). It allowed these MNEs to combine the high technology they developed at home with low-wage workers abroad. Through these GVCs, international

trade started to shift from ‘trade in goods’ to ‘trade in tasks’ (Bournakis et al, 2011). Today, world trade parts and components have grown remarkably (Athukorala and Menon, 2010).

But, as always, matters are not that simple. Whether or not outward FDI by MNEs is a source of technology transfer and therefore has increased the productivity of local firms is not easy to ascertain. Meanwhile, the increase in the productivity of local firms can be influenced directly through joint ventures where the partner firm in a developing country directly benefits from the technological and managerial know-how of its foreign partner. It can also be influenced indirectly through externalities whereby domestic firms’ performance and productivity are affected, either positively or negatively, by the presence of the foreign firm or joint venture. The latter can occur through the competition from the MNE, through demonstration effects, through knowledge and technology flows and/or through supplier-buyer relations. Effects on competitors are referred to as ‘horizontal spillovers’ and the effects on buyers and suppliers as vertical spillovers.

We now turn to examine the extent to which manufacturing structural change is driven by domestic investment in absorptive capabilities or by FDI in both East Asia and Latin America. Technology gaps provide a huge potential for catch up as in Geerschenkron (1982) and Abramovitz (1989b), if absorptive capacities are in place – in the absence of which countries can fall behind. Whereas technological transfer through FDI may be important in theory, in practice it is often constrained due to a lack of domestic absorptive capacity.

Table 1.5 reveals the extent of domestic investment in absorptive capabilities using commonly used indicators – expenditure on R&D as percentage of GDP, engineering industries relative to US and patents granted by the US Patent Office (USPTO) – for East Asian and Latin American countries.

As a result of significant growth in R&D expenditure in Asia, the region has achieved greater number of patents granted and increased the share of engineering industries in manufactured value added relative to Latin

America. According to the OECD, between 1995 and 2005, China average gross domestic expenditure on R&D grew at an annual rate of 19 per cent, as the economy expanded at a rate of about 10 per cent.

Table 1.5
Indicators of technology

Region	engineering industries relative to United States 2002-2007	Spending on R&D as share of GDP 1996-2007	Patents per million inhabitants 1995-2008
Latin America	0.2	0.4	0.5
Asia	1.0	1.2	30.5
Advanced economies	1.0	2.4	132.6

Note: Share of engineering industries in manufactured value added (ratio with respect to share in the United States). Latin America: Argentina, Bolivia, Brazil, Chile, Columbia, Mexico and Uruguay. Asia: Republic of Korea, Philippines, India, Malaysia, Singapore and Taiwan (China). Advanced economies: France, Italy, Japan, Sweden, UK, US.

Source: Cimoli and Porcile (2011); ECLAC (2007).

One possible explanation for disparate technological progress may be the success and relative failures of the various countries’ educational policies. In examining the policy interventions by East Asian governments to advance technological capabilities, Sanjaya Lall stressed that one common basic element is the creation of human capital (Lall, 2004, Altenburg, et al, 2008). High performance growth and structural transformation in East Asia relate to building capabilities through learning, and accumulating productive capabilities by investing in physical and human capital.

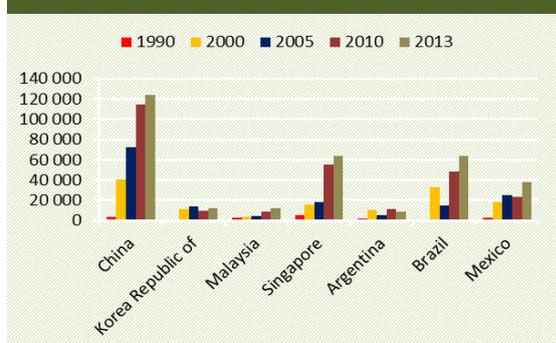
Numerous studies have shown that one of the major differences between the success stories of East Asia and the experiences of Latin America has been that the East Asian economies have made the transition to knowledge generation, whereas Latin America is lagging behind in this respect (Cimoli and Porcile, 2011, ECLAC, 2008, Palma, 2009 and 2011). As also pointed out by Augusto de la Torre, the World Bank’s chief economist for Latin America: “after the Second World War the East Asian economies linked up to Japan, and in the process of getting connected they created the ‘Asian Factory’. It became a virtuous circle. The better they connected to the world, the better they connected to each other.” Latin America’s post-war experience

has been the reverse: “We were connected to the most important growth centre, the United States. But instead of the ‘Latin American Factory’, we got dependency theory, structural adjustment and a lot of disappointment” (The Economist, 2014).

Hausman (2011) has further demonstrated that Latin America’s lower long term growth rate is correlated with a poorer-quality export basket and with the fact that it is in general, located in less dense portions of the product space compared to the East Asian region which is situated in high-density portion of the space.

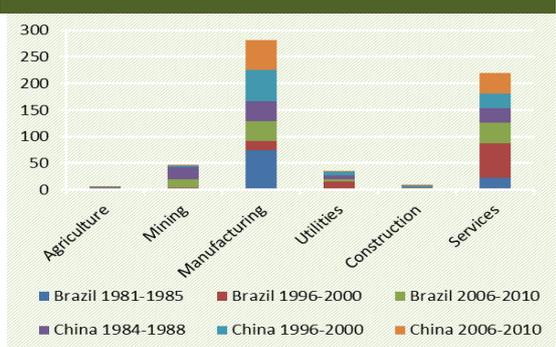
Next we examine the extent of FDI flows in facilitating technological advancement and innovation as well as structural change in the East Asia and Latin American regions. We measure this by the amount and share of inward FDI going into both regions and the composition of FDI by sector. The results are presented in Figures 1.14-1.15 and in Table 1.6.

Figure 1.14
FDI inflows (US\$ millions)



Source: UNCTAD

Figure 1.15
Sectoral distribution of total FDI (%)



Source: Naude et al, 2013

Table 1.6
Sectoral distribution of FDI (% of manufacturing FDI)

	Brazil			China		
	1981-1985	1996-2000	2006-2010	1984-1988	2000-2005	2006-2010
Food beverages and tobacco	10.5	18.5	10.9	-	6.2	9.3
Textiles	0.8	2.0	2.0	-	4.8	2.5
Leather and footwear	1.4	0.2	0.7	-	3.1	2.3
Wood and products of wood	2.3	0.9	0.9	-	0.6	0.3
Pulp, paper products and publishing	3.2	0.9	9.5	-	8.4	3.5
Coke, refined petroleum	9.2	0.2	9.1	-	3.4	3.9
Chemical products	16.4	16.7	9.1	-	10.1	14.3
Rubber and plastics	3.6	3.2	3.6	-	5.8	3.8
Other non-metallic mineral products	1.7	6.1	2.6	-	3.3	4.5
Basic metals	9.3	3.7	31.7	-	6.6	11.1
Machinery NEC	11.0	7.4	4.1	-	6.2	7.9
Electrical and optical equipment	9.8	15.7	5.3	-	29.7	23.8
Transport equipment	18.4	23.0	9.6	-	9.7	11.5
Furniture, manufacturing n.e.c. and recycling	2.4	1.2	0.7	-	2.2	1.3

Source: Naude et al, 2013

The largest chunk of FDI goes to China, especially after the period 1985 to 1990. FDI has driven China’s export-led growth as well as industrialisation, with most FDI flowing into manufacturing sectors (particularly electrical and optical equipment, chemical products, transport equipment and basic metals). However in Brazil, as in most of the Latin American economies, FDI is increasingly orientated to services, less becoming less conducive to manufacturing and industrialisation.

The main lesson to be drawn is that, above and beyond the fact that different branches of production have different capacities for leading the way to gains in productivity, in today’s developing countries the key to robust growth is the synchronisation of export development, production linkages and technological capacity building.

Industrial policy

How did governments actually intervene in East Asia? With some exceptions, the economies shared a few common characteristics, stable business environment with low inflation, prudent fiscal policies, exchange rate to promote export competitiveness, financial development with gradual liberalisation, efforts to minimise price distortions, emphasis on education and skill acquisitions (Yusuf, 2001). However, there were big differences in the importance of foreign investment, state-owned enterprises, and import protection.

Japan has been the most successful economy in the region and a pioneer in the use of industrial policies. And Korea has followed the steps of Japan in the utilisation of industrial policy (Amsden, 1989). The industrial policies in both economies initially protected local firms from foreign competition. Their governments selected key industries, gave them preferential treatment including tax deductions and exemptions and tried to help them become competitive with foreign multinational corporations.

But by the 1960s, Japan began introducing liberalisation policies to attract FDI, while Korea began to welcome foreign technology in the 1970s. Nonetheless, there was little foreign investment in these economies (as we have seen with Korea in figure 1.14 above). Foreign firms did not enjoy the same preferential treatment as domestic firms. Yet, only those firms that achieved their export targets received more favourable treatment. The government of both economies emphasised the achievement of economies of scale, regulated entry and competition in the preferred sectors, and encouraged mergers and market sharing agreements. Local business groups were providing the necessary entrepreneurship, while foreign loans (in the case of Korea) and domestic borrowing (in the case of Japan) were used to fund industrial development. Cooperation and coordination between government and private sector helped to make domestic firms more competitive in the face of liberalisation.

In contrast with Japan and Korea, FDI played a major role in most of the East Asian countries. Industrial policy in those countries were centred on the central government establishing Export Processing Zones (EPZs) to attract FDI not only for export purposes but for technology transfers and for spillover effects and backward linkages through joint ownership with local firms (Lai, 2006). Foreign firms enjoyed the same preferential treatment that domestic firms did under the Japanese and Korean model, but were requested to export competitive products to the global market. The degree to which tax are lowered depends on the percentage of a company's total production that was exported.

The resulting increase in the percentage of joint ventures led to a much higher usage of local inputs. Moreover, other incentives were used to encourage the purchase of local inputs. In some countries, technical experts were placed in local suppliers to upgrade the quality of the products sold to the EPZs. In others, common norm emphasising things like the importance of quality were built up through the placement of officials from the zones into local firms (Radelet, 1999).

Where approval of 100 per cent ownership was granted to enable new entrants not to have problems finding good capital partners, as in Malaysia, it was under certain conditions, including export target of more than 80 per cent of production or 50 per cent of production plus employing more than 350 full time workers (Aoki, 1994). Where concerns were on the shortage of skilled and semiskilled workers, human resource development measures were supplemented with foreign labour from other countries within the region. Where the problem was weak link between local firms and the firms operating in EPZs, supporting industries were developed to connect the two entities.

Similarly, China used import substitution and export promotion strategies simultaneously, combining them in the most efficient way to secure the industrialisation objective (Kuchiki, 2007; ECA, 2011). Of the many factors that have contributed to China's industrial development and technological rise, the role of government policy has been very critical.

The government of China developed a group of enterprises, called "pillar industries," by merging and reorganising state-owned enterprises in manufactures namely, automobile, machinery, electronics, petrochemical and construction. Because the government controls the banking sector, it can direct invest toward these strategic areas. In addition, foreign investors were invited to help foster domestic industries by expanding the domestic capital base and advancing the state of domestic technology.

Support to domestic industries had to be carried out within the framework of globalisation. A poor performer was not supported even if it was in a targeted industry.

There was proper monitoring and evaluation in place to constantly review whether the strategically supported industries' productivity performance proved better than that in non-strategic sectors (Weiss, 2005).

By helping small Chinese enterprises grow into medium and large enterprises, the country has also voided the shortage of medium firms (Dinh, 2014). It should be noted however that government does not promote SMEs at the expense of large firms. The SMEs provide jobs, while the large enterprises provide sub-contracting work for the SMEs. Similarly, the government does not support new firms except through the provision of land and factory shells, but, once a firm is established and is doing well, the government is available to offer many services. This might include streamlined administrative procedures, support for technological upgrading, and access to market information through networking. The goal is to guide the firm and the industry to become nationally competitive. The government has thus played a critical role in facilitating the creation of input and output markets around which industrial value chains and clusters have evolved.

China has encouraged the development of indigenous Chinese-technology standards (Ahrens, 2013). Not only does it prioritise purchases and usage of the standards, it also can restrict the usage of competing international standards. And it can erect barriers to entry for foreign products by requiring compliance with complex and burdensome localisation requirements and standards.

There are two important lessons to be drawn. First, gaining market access is very challenging. It depends not only on flows of FDI but mostly on local firms emerging successfully from an expanding domestic market and connecting with regional and global value chains. Second is about the diversity of experiences. The selection and implementation of policies varied enormously and was highly dependent of the conditions facing each of the East Asian governments. Countries will therefore have to focus their scarce resources on selected areas, discover the binding constraints in each area, apply policies to remove these constraints, and

proactively develop competitive value chains and clusters in the industries where they have a comparative advantage in resource-based, labour-intensive manufacturing.

Institutions

The extent to which industrial policies have succeeded in developing an industrial base does not only depend on the levels of policy implementation, but also on the administrative capacity of key institutions involved. Building a qualified and dedicated bureaucracy with sound knowledge of the portfolio of policy instruments at its disposal, including carrots and sticks, is critical for successful structural transformation.

Much has already been learned about how to design incentives and institutions to avoid abuse and capture (Rodrik, 2007). Amsden (2001) has referred to the need for “reciprocal central mechanism,” a set of institutions that discipline economic behaviour on the basis of feedback information that has been collected and assessed. In less effective system, failing projects persisted because bureaucrats had been hijacked by business interests that became dependent on the state. Desirable features of good incentive programmes include standard setting, automatic sunset clauses, built-in programme review, monitoring the establishment of clear benchmarks for success or failure, and periodic evaluation exercises (most of which we have witnessed in East Asia, as discussed in the preceding subsection). The application of these instruments requires competent public agencies and effective coordination.

Coordination is necessary to avoid capture. Drawing from East Asian experiences, the easy way out would be to defend the existence of an insulated bureaucracy in the State, disconnected from political pressures. However, the notion of “insulation” is not applicable to democratic and open societies in the twenty-first century. In this vein, Evans (1995), Stiglitz (1998) and Devlin and Moguillansky (2009) have emphasized that partnership and public-private alliances – that is, consultation and coordination between public and private institutions, focusing on concrete objectives – are necessary to avoid

capture and to put policies on an effective course.

Conclusion

It is certainly true that firms that are exposed to foreign competition have no choice but to either become more productive or shut down. As trade barriers come down, industries have rationalised, upgraded and become more efficient. But an economy's overall productivity depends not only on what is happening within industries, but also on the reallocation of resources across sectors (otherwise known as structural change). This is where globalisation has produced a highly uneven result as observed in the above analysis of Asia and Latin America. This divergence of performances in both regions is a fundamental reality of developing societies. Looking back at some of the salient similarities and differences between the two regions:

- Structural change in manufacturing was more pronounced in East Asia than Latin America. Increases in exports in medium and high-tech sectors led to large increase in share in manufacturing value added and employment in the same sectors in East Asia.
- As a result, East Asia has been more successful in diversifying its exports and creating new dynamic comparative advantages in high value added products. In contrast, Latin America has remained highly specialised in commodities and resource-intensive manufactures.
- Both Latin America and East Asia have opened their markets and reduced tariffs (although this was much faster in the former) achieving comparable levels of protection.
- Despite higher tariffs, East Asian economies have more successfully integrated into the global economy than Latin American economies as measured in trade as a proportion of GDP.

Hence, structural change is the key to significant and sustained growth, and opening up a country to international trade in itself does not (has not) lead to such structural change. The relative success that East Asia has achieved in terms of export growth and structural change is a reflection of the greater success in the evolution of its comparative advantage and in the ability of its industries to adjust to trade reforms. In contrast, the Latin America specialized according to its static comparative advantages in sectors that offered fewer opportunities for diversification and improvements in product quality. The latter has illustrated, the technological gap widened in relation with the dynamic Asian economies. East Asian region demonstrated rather a pronounced complementarity between the government's consistently proactive policies to attract FDI and coherent and equally proactive policies in support of the development of local firms' capabilities.

Chapter 2

Benchmarking South Africa's trade

Is South Africa's economy relatively open, if so, to what extent has it engendered structural transformation and where can the greatest benefits from trade be reaped? In this chapter we attempt to respond to these topical questions.

Evolution of trade reform in South Africa

In the twenty years since the end of apartheid, the South African government has taken significant steps to liberalise trade in order to address unemployment, poverty and inequality. This section describes the main steps and sequencing of this liberalisation process.

Until the process of trade liberalisation began in the early 1990s, South Africa's trade regime was characterised by a high and complex tariff structure and extensive import controls. South Africa had a very restrictive trade regime, with an unweighted average tariff rate of 25 per cent, a battery of import controls that covered some 15 per cent of tariff lines, and a large export subsidisation scheme. South Africa's trade regime was also considered highly complex, with the highest number of tariff lines and widest range of tariff rates in the developing world.

The year 1994 signalled an important shift in South Africa's development strategy, from export promotion with import controls to greater openness through tariff liberalisation. This shift is most strongly reflected in South Africa's commitment, in the 1995 General Agreement on Trade and Tariffs (GATT) Uruguay Round under the auspices of the World Trade Organisation, to bind 98 per cent of all tariff lines, rationalise the over 12 000 tariff lines and replace quantitative restrictions on agricultural products with tariffs (Cassim et al, 2004, Edwards 2005). In addition, South Africa offered to reduce the number of tariff categories to six at rates ranging from 0 to 30 per cent with any discretionary changes to the system being disallowed.

Trade reform was accompanied by a number of government policies, including the "Growth, Employment and Redistribution" (GEAR) strategy – embodied Washington Consensus-type reforms theorizing that liberalization of key markets would lead to more efficient allocation of capital and thereby raise private investment levels and growth and employment rates – that aimed at, in part, to transform South Africa into a "competitive, outward oriented economy." (RSA 1996). Government also finally deregulated the agricultural marketing and control boards, including import controls on agricultural products, established under the Agricultural Marketing Act of 1968.

These policies imitated a process of tariff reform. A tariff rationalisation process aimed at reducing and simplifying the tariff structure, was subsequently formulated in 1996. Quantitative restrictions in form of specific, mixed, compound and formula duties' were replaced with *ad valorem duties*. The export incentive was abolished by 1997. In 1990, the tariff schedule consisted of 13 609 tariff lines and 28 per cent were subject to import control. By 2006, the number of tariff lines had been reduced to 6 420, a decline of 53 per cent, and import controls have been reduced dramatically. South Africa's simple average tariff declined from around 23 per cent in the early 1990s to 8.2 per cent in 2006. At the same time, the proportion of zero-rated tariff lines rose to about 56 per cent. Also non-tariff measures were phased out, particularly those relating to agricultural and processed food products. In general, the bulk of South Africa's tariff reform took place prior to 2000 and only limited reductions and rationalisations took place subsequently.

In conjunction with increasing multilateral liberalisation, government has also engaged in a number of bilateral and regional trade negotiations and agreements culminating in South Africa's implementation of the SADC Free Trade Protocol and the implementation of the South Africa-European Union Trade

Development and Cooperation Agreement (TDCA), now revised as part of Economic Partnership Agreement (EPA). South Africa also entered into agreements with the following regional blocs, SACU and European Free Trade Association (EFTA), Preferential Trade Agreement (PTA) with MERCOSUR (not yet ratified), the Tripartite Free Trade Area (T-FTA) between SACU and non-SADC Members (EAC and COMESA). The country is also a beneficiary of a number of non-reciprocal trade arrangements, among them the African Growth and Opportunity Act (AGOA) and the Generalised System of Preferences.

The scope and speed of this trade liberalisation process is apparent in table 2.1. South Africa ranks 14 out of the G20 countries in terms of the number of protectionist or trade restrictive measures taken between 2008 and 2011. The EU 27 member countries are the highest ranked. China, India and Brazil are amongst the top 10 in the G20 group. The general implication is that South Africa is a relatively open economy, only moderately protected by tariffs.

Table 2.1
Countries ranked by number of trade restrictive measures taken during 2008-2011

Country/region	Ranking
EU27	1
China	4
India	5
Brazil	9
South Africa	14

Source: Debaele: *The 11th GTA report on protectionism, 2012*

Taking into account South Africa's trade liberalisation history discussed earlier, it is clear that South Africa liberalised at a much faster pace compared to the EU27, China, India and Brazil amongst others.

The impact on trade flows

Trade tariffs and trade liberalisation are instruments of policy. The relevant measure of effectiveness of policies is whether they contribute to desired change in trade flows. We learnt from the East Asian experience in the preceding chapter that trade liberalisation

on its own cannot lead to sustainable growth and employment unless it engenders structural change. The degree of prosperity realised from trade depends on what a country trades on, how much it can trade and who it can trade with. In this section we assess the impact of trade liberalisation on South Africa by simply tracking trade trends, looking at whether the necessary structural change or new trade pattern has emerged, and if not, why, where South Africa trade performance could be improved and where the greatest benefits from trade can be reaped.

How has trade changed in the last two decades?

As a result of trade liberalisation, South Africa's trade has expanded enormously over the past two decades. Figures 2.1-2.4 show that the value of total South African trade (exports plus imports) rose from US\$ 61.7 billion in 2001 to US\$ 229.3 billion in 2013, which is equivalent to 13 per cent growth per year on average in current dollar terms. Imports picked up more quickly from 2002 and remained above exports throughout the period under review, leading to a deteriorating balance of trade since 2002. Merchandise trade recorded faster growth over the same period, advancing from US\$ 51.6 billion in 2001 to US\$ 199 billion in 2013, or 13.6 per cent per year. Despite being relatively slow, trade in services has increased more than three-fold between 2001 and 2013.

Figure 2.1
Trade in goods and services, 2001-2013
(million US dollars)

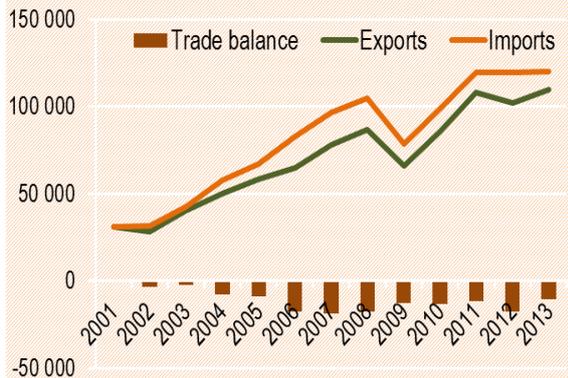


Figure 2.3
Trade in services, 2001-2013 (million US dollars)

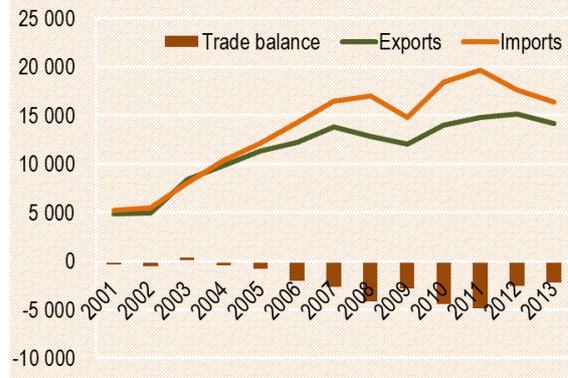


Figure 2.2
Trade in goods, 2001-2013 (million US dollars)

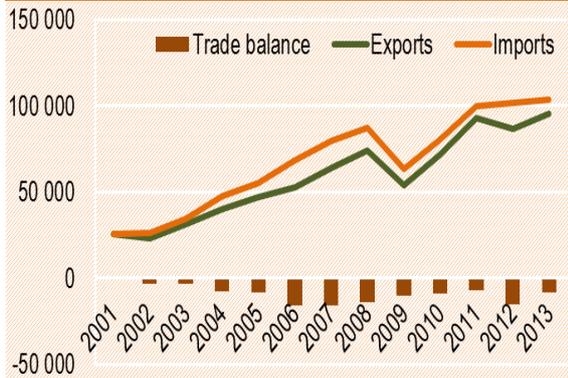
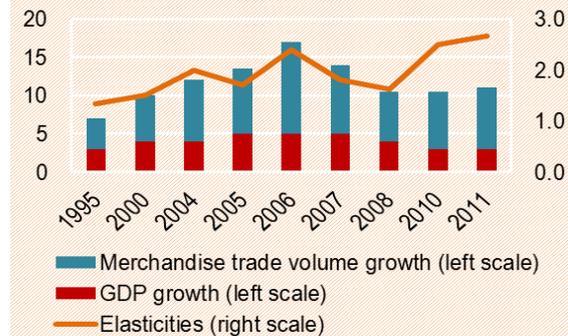


Figure 2.4
SA merchandise trade volume and real GDP, 1995-2011 (annual percentage change)



Source: International Trade Centre, COMTRADE

Source: WTO database

The most significant fact about South Africa's trade since 1995 is that it has grown much faster than its output for most of this period. This is illustrated by Figure 2.4, which shows annual growth rates for the volume of South Africa's merchandise trade (i.e. the average of exports and imports) and the country's real GDP growth, together with implied elasticities of trade with respect to its GDP (defined as the percentage change in trade volume corresponding to a 1 per cent change in real GDP).

Note: Merchandise trade (the average of exports and imports) in volume terms, that is they are adjusted to account for inflation and exchange rate movements

Trade and GDP growth are represented by vertical bars and are measured against the left axis. Elasticity is shown as a solid line and is measured against the right axis. The growth of merchandise trade in volume terms increased at a slightly faster pace of 4 per cent in 1995, while output grew at 3 per cent, implying an elasticity of greater than 1.

Since 2000 South Africa's trade has grown nearly twice as fast as output. Trade growth averaged 7.8 per cent per year between 2000 and 2011 compared to the 4 per cent average rate for GDP for the same period. This indicates that South Africa's trade grew about 1.95 times as fast as output.

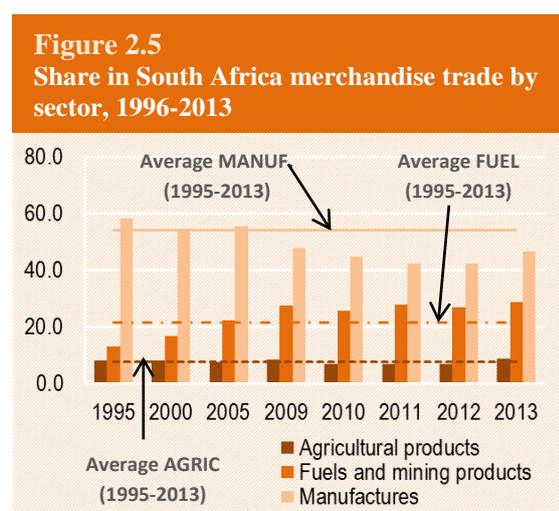
Many factors may have contributed to this remarkable expansion of trade but the fact that it coincided with a significant reduction in trade barriers is inescapable.

Has the structure of trade changed?

Just as the relative importance of South Africa in international trade has shifted over time, so has the mix of traded goods. This sub-section examines the evolving composition of trade,

including the sector and product breakdown of merchandise trade. It also looks at the extent to which trade flows have contributed to the process of structural change and how the contribution compares to international experience from the liberalising economies.

Figure 2.5 shows that South African exports and imports are concentrated in manufactured goods. Despite the marginal gain recorded in 2013, the share of manufactured goods in total merchandise trade still remained below average of 54 per cent for the period 1995-2013. The sector is yet to reclaim the 2009 pre-crisis levels. Manufactures accounted for 65.3 per cent in 1996-1999, but this declined to 54.7 per cent in 2000-2003 to 53.7 per cent in 2004-2007 and finally to 44 per cent in 2010-2013. Agricultural products saw their share in South Africa trade increased from 7.8 per cent at the turn of the last decade to 8.3 per cent in early 2000 before declining again to 7.2 per cent in 2004-2007, and finally to 7.5 per cent in 2010-2013.



Source: WTO database

The advance of manufactured goods was only slowed by rising primary commodity prices, which in recent years have tended to inflate shares for fuels and mining products at the expense of manufactures. Unlike both agricultural products and manufactured goods, the share of fuels and mining products in South Africa trade has risen persistently since 1995.

The major categories of South African exports and imports are presented in Table 2.2. Nominal merchandise exports rose 13.8 per

cent over the period 2010-2013 while imports rose 15.2 per cent. South Africa's export profile remains resource based, with mineral products and precious stones accounting for almost 50 per cent of total exports between 2010 and 2013. The top five export product groups grew at double digits except precious stones which recorded a negative average annual growth rate of 0.2 per cent in the same period. Import profile is dominated by a mixture of capital equipment and consumer goods. The top five import products recorded significant declines during the period 2010-2013.

Table 2.2
Major export and import categories

No.	Export industries	2002-2005			2006-2009			2010-2013		
		\$ billion	Share	Growth	\$ billion	Share	Growth	\$ billion	Share	Growth
	Total	113	72.0%	15.7%	159	79.2%	6.2%	219	79.3%	13.8%
1	Mineral products	222	14.2%	11.7%	354	17.7%	22.7%	688	24.9%	23.3%
2	Precious stones	371	23.6%	12.7%	513	25.6%	6.1%	655	23.7%	-0.2%
3	Basic metals	264	16.8%	13.4%	348	17.4%	4.5%	380	13.8%	21.2%
4	Transport equipment	139	8.9%	13.2%	184	9.2%	7.4%	246	8.9%	17.1%
5	Machinery and appliances	133	8.5%	13.9%	188	9.4%	3.0%	220	8.0%	17.8%

No.	Import industries	2002-2005			2006-2009			2010-2013		
		\$ billion	Share	Growth	\$ billion	Share	Growth	\$ billion	Share	Growth
	Total	114	71.5%	22.6%	168	72.9%	6.6%	226	72.6%	15.2%
1	Machinery and appliances	432	27.1%	11.6%	593	25.8%	5.5%	770	24.7%	-15.1%
2	Mineral products	228	14.3%	13.9%	489	21.3%	9.9%	687	22.0%	-18.9%
3	Transport equipment	180	11.3%	24.4%	241	10.5%	-3.6%	329	10.6%	-14.6%
4	Chemical products	160	10.0%	9.0%	199	8.6%	10.2%	284	9.1%	-13.7%
5	Parts for motor vehicles	139	8.7%	15.3%	154	6.7%	-5.3%	192	6.2%	-13.7%

Source: International Trade Centre, COMTRADE

South African export strengths can be viewed in the dataset presented in Table 2.3. Despite its increased exposure to the rest of the world, the share of South Africa's exports in the global market remained muted since 2001. This implies that South Africa's trade openness is import-driven. Its exports represent 0.47 per cent, 0.45 per cent and 0.5 per cent of world merchandise exports in 2001, 2007 and 2013 respectively.

Nonetheless, a number of sectors have benefited from the marginal increase of 0.05 per cent in its world market share recorded between 2007 and 2013. Fourteen sectors produced 1 per cent or more of South African exports in 2013. Six of these product lines are essentially primary products. The other eight products are more highly processed (manufactured) goods.

Slightly over half of 45 large export sectors listed in Table 2.3 (23 to be precise) have import/export ratios greater than one (the remaining 22 sectors with import/export ratios less than 1). This provides some evidence of intra-industry trade in parts and components and accordingly, good South African interconnections into global supply chains. While international developments tend to promote globalisation, South Africa can further integrate itself into these supply chains efficiently such that the exportable sector can be able to obtain parts, components and capital equipment at the lowest possible import price and it can be able to export components and final goods of international quality at internationally competitive prices.

Table 2.3 also measures the structural performance of South Africa's exports. In our approach, we divide export products into four groupings (rising, falling, lost and limited opportunities) according to two criteria (i) whether the world import for the product (in 2007 and/or 2013) is growing faster or slower than average (2005-2007 and/or 2011-2013) and (ii) whether South Africa's market share (between 2005 and 2007 and/or 2011 and 2013) is growing or shrinking. The South Africa's market share is derived from total exports for South Africa's product to the world compared with the world import for that product:

- A *developed product* for South Africa (in either 2007 and/or 2013) is one in which the world market is growing faster than average (in both periods) and South Africa's market share is rising.
- If world trade growth is below average but the country has a rising market share, the product is called a *traditional product*.
- The third type of product may be called an *emerging product*; the world market is growing faster than average but the country's market share is declining.
- The polar extreme product type is called a *dormant product*, reflecting a sector without solid future growth potential.

The structural status of these sectors in terms of *developed* and *traditional* classifications involves growing country's market shares in both 2007 and 2013. There are fourteen (fifteen) such sectors in 2007 (2013) in the 45 sectors listed. South Africa's market share increased regardless of the weak world market growth position as demonstrated by high number of traditional sectors in 2013. *Dairy products* (04) and *Cereal, flour, starch etc.* (19) were a developed performer for South Africa in both years.

The country's *emerging* performing export sectors probably also include a number of sectors where South Africa's market share is falling despite growing world market. This is the case of *Electrical and electronic equipment* (85), *Paper and paperboard* (48), *Pulp of paper* (42), *Pharmaceuticals* (30) and *Edible vegetables* (07). *Electrical and electronic equipment* has been the basis of Chinese trade growth over the last two decades. While the country is a large net importer of this sector's products (import/export ratio is greater than 1), the sector is showing some promise with over 2 per cent of exports in these products in 2007 and 2013.

There are a number of sectors which have not performed well on these measures. *Pearls, precious stones, metals, etc.* (71), *Machinery* (84) *Salt, sulphur etc.* (25), *Tools* (82) and *Meat and edible meat* (02) are examples where the sector has moved from developed status in 2007 to a dormant in 2013 – South Africa's market share has fallen and world market growth has fallen below average. The first sector's performance may reflect weak global demand and various strikes characterising the domestic economy in that year. South Africa's export share in Pearls, precious stones, metals etc. has fallen from 20 per cent in 2007 to 18 per cent in 2013.

Table 2.3
Major South African export sectors

HS	Sector	Structural performance		Export share		Trade ratio (M/X)
		2007	2013	2007	2013	2013
'71	Pearls, precious stones, metals, coins, etc	developed	dormant	20.4	18.4	0.1
'26	Ores, slag and ash	traditional	traditional	6.9	14.4	0.0
'27	Mineral fuels, oils, distillation products, etc	traditional	dormant	10.6	10.8	0.2
'87	Vehicles other than railway, tramway	emerging	dormant	7.9	8.7	1.1
'84	Machinery, nuclear reactors, boilers, etc	developed	dormant	9.2	7.0	2.2
'72	Iron and steel	emerging	dormant	11.7	6.7	2.2
'08	Edible fruit, nuts, peel of citrus fruit, melons	emerging	developed	2.3	2.8	0.0
'85	Electrical, electronic equipment	traditional	emerging	2.5	2.4	4.7
'76	Aluminium	dormant	traditional	3.6	2.0	0.3
'39	Plastics	emerging	traditional	1.0	1.6	1.7
'22	Beverages, spirits and vinegar	emerging	traditional	1.4	1.5	0.5
'29	Organic chemicals	emerging	dormant	1.6	1.4	1.3
'28	Inorganic chemicals	emerging	dormant	1.8	1.0	1.4
'10	Cereals	emerging	dormant	0.1	1.0	1.2
'48	Paper and paperboard	developed	emerging	1.2	0.8	1.4
'74	Copper	traditional	dormant	1.4	0.7	0.6
'47	Pulp of paper	emerging	emerging	0.8	0.7	0.1
'40	Rubber	emerging	dormant	0.6	0.7	2.3
'20	Vegetable, fruit, nut, etc food preparations	emerging	dormant	0.5	0.7	0.4
'94	Furniture, lighting, signs, prefabricated buildings	emerging	dormant	0.9	0.6	1.4
'90	Optical, photo, technical, medical, etc apparatus	traditional	dormant	0.5	0.6	4.2
'17	Sugars and sugar confectionery	dormant	traditional	0.5	0.6	1.0
'64	Footwear, gaiters and the like, parts thereof	dormant	dormant	0.0	0.2	5.2
'75	Nickel and articles thereof	emerging	traditional	0.7	0.5	0.1
'03	Fish, crustaceans, molluscs, aquatic invertebrates nes	dormant	dormant	0.7	0.5	0.5
'44	Wood	emerging	emerging	0.6	0.5	0.9
'25	Salt, sulphur etc	developed	dormant	0.4	0.5	0.5
'31	Fertilizers	emerging	traditional	0.3	0.5	1.2
'30	Pharmaceutical products	emerging	emerging	0.2	0.5	5.3
'34	Soaps, lubricants, waxes, candles, modelling pastes	emerging	traditional	0.2	0.5	0.7
'88	Aircraft, spacecraft, and parts thereof	dormant	dormant	0.8	0.4	1.9
'86	Railway, tramway locomotives, rolling stock, equipment	developed	traditional	0.4	0.4	0.8
'32	Tanning, dyeing extracts, tannins, derivs, pigments etc	developed	traditional	0.3	0.4	1.4
'24	Tobacco and manufactured tobacco substitutes	emerging	dormant	0.3	0.3	0.5
'15	Animal, vegetable fats and oils, cleavage products, etc	emerging	dormant	0.1	0.3	2.8
'04	Dairy products, eggs, honey, edible animal product nes	developed	developed	0.1	0.3	0.5
'11	Milling products, malt, starches, inulin, wheat gluten	emerging	traditional	0.0	0.3	0.6
'82	Tools, implements, cutlery, etc of base metal	developed	dormant	0.3	0.2	2.1
'68	Stone, plaster, cement, asbestos, mica, etc	emerging	traditional	0.3	0.2	1.9
'70	Glass and glassware	emerging	dormant	0.1	0.2	1.3
'19	Cereal, flour, starch, milk preparations and products	developed	developed	0.1	0.2	0.7
'23	Residues, wastes of food industry, animal fodder	emerging	dormant	0.1	0.2	2.9
'02	Meat and edible meat offal	developed	dormant	0.1	0.2	3.5
'07	Edible vegetables and certain roots and tubers	emerging	emerging	0.1	0.2	0.6
'36	Explosives, pyrotechnics, matches, pyrophorics, etc	emerging	dormant	0.1	0.2	0.3

Source: International Trade Centre, UNCTA

An alternative measure of international competitive strength is revealed comparative advantage. An index greater than (less than) one indicates a comparative advantage (disadvantage) in that product. The results for South Africa in relation to the World are presented in Table 2.4.

As one would expect, South Africa had a revealed comparative advantage (RCA) index greater than one in 2013 in the broad range of products towards the top of the major export sector list in Table 2.3. However, there are major differences to the order in which they appear in the RCA list and the top export list.

This calls for more synergies between trade and industrial policy. For example, South Africa has a revealed comparative advantage in *Pearls, Ores, Vehicles, Iron and Steel, Edible fruits, Aluminium* and *Beverages*. These products are however toward the top of the major export list in Table 2.3. Furthermore, sectors such as *Minerals, Machinery, Plastics, and Electrical and electronic equipment* are amongst the top 10 exports and South Africa has a revealed comparative disadvantage in these products.

Table 2.4
Revealed comparative advantage indices

Chapter	Sector	2006	2013	Compound average growth rate (CAGR)
'26	Ores, slag and ash	7.8	10.4	4%
'36	Explosives, pyrotechnics, matches, pyrophorics, etc	4.9	6.4	3%
'94	Furniture, lighting, signs, prefabricated buildings	16.5	6.0	-12%
'71	Pearls, precious stones, metals, coins, etc	10.2	5.6	-7%
51	Wool, animal hair, horsehair yarn and fabric thereof	3.6	5.3	5%
'08	Edible fruit, nuts, peel of citrus fruit, melons	5.0	5.2	0%
'75	Nickel and articles thereof	2.4	3.2	4%
'72	Iron and steel	3.8	3.1	-3%
'47	Pulp of wood, fibrous cellulosic material, waste etc	3.2	2.9	-1%
'11	Milling products, malt, starches, inulin, wheat gluten	0.7	2.5	17%
'22	Beverages, spirits and vinegar	2.5	2.4	0%
41	Raw hides and skins (other than furskins) and leather	1.5	2.4	6%
'76	Aluminium and articles thereof	3.6	2.2	-6%
'17	Sugars and sugar confectionery	3.1	2.0	-5%
'20	Vegetable, fruit, nut, etc food preparations	2.1	1.9	-1%
'25	Salt, sulphur, earth, stone, plaster, lime and cement	1.4	1.9	4%
'81	Other base metals, cermets, articles thereof	2.3	1.9	-3%
'86	Railway, tramway locomotives, rolling stock, equipm	1.7	1.6	0%
'34	Soaps, lubricants, waxes, candles, modelling pastes	0.7	1.6	11%
'28	Inorganic chemicals, precious metal compound, isotc	2.9	1.4	-9%
'10	Cereals	0.7	1.4	9%
'31	Fertilizers	1.3	1.3	0%
'21	Miscellaneous edible preparations	0.8	1.3	6%
'24	Tobacco and manufactured tobacco substitutes	1.6	1.3	-2%
'87	Vehicles other than railway, tramway	1.0	1.2	1%
'33	Essential oils, perfumes, cosmetics, toileteries	0.8	1.0	4%
'38	Miscellaneous chemical products	1.2	0.9	-3%
'78	Lead and articles thereof	0.6	0.9	4%
'73	Articles of iron or steel	0.9	0.9	0%
'03	Fish, crustaceans, molluscs, aquatic invertebrates ne	1.3	0.8	-6%
'99	Commodities not elsewhere specified	2.2	0.8	-11%
'74	Copper and articles thereof	1.1	0.8	-4%
'48	Paper and paperboard, articles of pulp, paper and bo	0.8	0.8	0%
'32	Tanning, dyeing extracts, tannins, derivs, pigments etc	0.6	0.8	3%
'14	Vegetable plaiting materials, vegetable products nes	0.3	0.7	14%
'82	Tools, implements, cutlery, etc of base metal	0.6	0.7	2%
'19	Cereal, flour, starch, milk preparations and products	0.2	0.7	15%
'06	Live trees, plants, bulbs, roots, cut flowers etc	0.8	0.6	-4%
'29	Organic chemicals	0.7	0.6	-3%
'27	Mineral fuels, oils, distillation products, etc	0.6	0.6	-1%
'84	Machinery, nuclear reactors, boilers, etc	0.7	0.6	-1%
'44	Wood and articles of wood, wood charcoal	0.9	0.6	-4%
'40	Rubber and articles thereof	0.6	0.6	-1%
'68	Stone, plaster, cement, asbestos, mica, etc articles	1.4	0.6	-11%
'04	Dairy products, eggs, honey, edible animal product ne	0.2	0.6	18%
'15	Animal, vegetable fats and oils, cleavage products, etc	0.2	0.5	14%
'39	Plastics and articles thereof	0.3	0.5	4%
'35	Albuminoids, modified starches, glues, enzymes	0.3	0.5	5%
'23	Residues, wastes of food industry, animal fodder	0.2	0.5	10%
'70	Glass and glassware	0.4	0.5	5%
'69	Ceramic products	0.3	0.5	5%
'16	Meat, fish and seafood food preparations nes	0.3	0.5	9%
63	Other made textile articles, sets, worn clothing etc	0.3	0.5	7%
'07	Edible vegetables and certain roots and tubers	0.3	0.5	9%

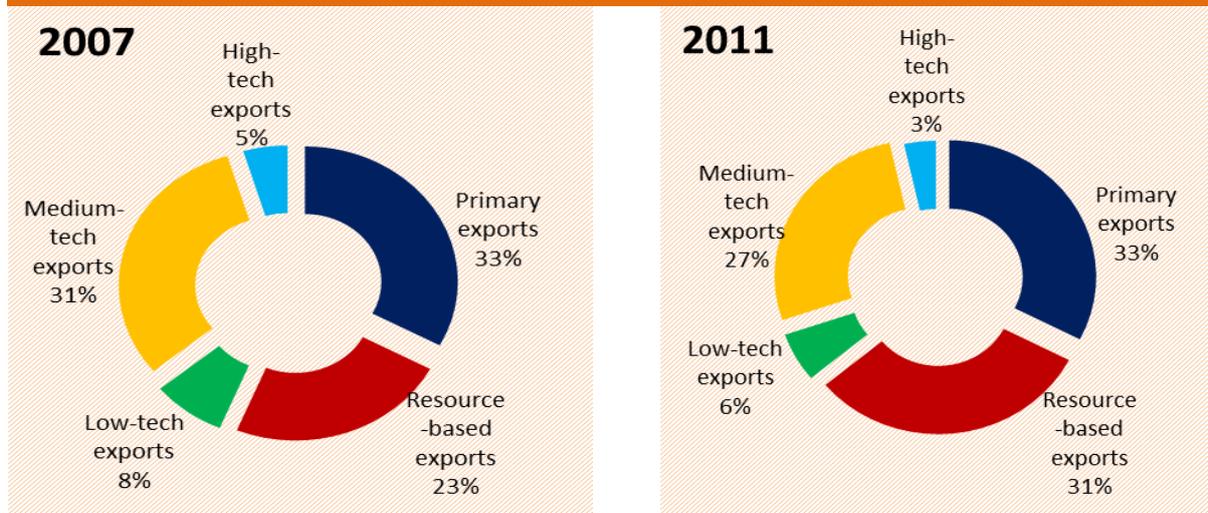
Chapter	Sector	2006	2013	Compound average growth rate (CAGR)
'49	Printed books, newspapers, pictures etc	0.6	0.5	-3%
'67	Bird skin, feathers, artificial flowers, human hair	0.2	0.5	13%
'09	Coffee, tea, mate and spices	0.3	0.5	6%
65	Headgear and parts thereof	0.4	0.5	4%
66	Umbrellas, walking-sticks, seat-sticks, whips, etc	0.7	0.4	-7%
'01	Live animals	0.2	0.4	10%
56	Wadding, felt, nonwovens, yarns, twine, cordage, etc	0.5	0.4	-2%
'83	Miscellaneous articles of base metal	0.3	0.4	5%
'05	Products of animal origin, nes	0.7	0.4	-9%
57	Carpets and other textile floor coverings	0.5	0.4	-3%
'97	Works of art, collectors pieces and antiques	0.3	0.4	5%
'12	Oil seed, oleagic fruits, grain, seed, fruit, etc, nes	0.4	0.3	-6%
59	Impregnated, coated or laminated textile fabric	0.3	0.3	-2%
'79	Zinc and articles thereof	0.5	0.3	-5%
'96	Miscellaneous manufactured articles	0.1	0.3	21%
'02	Meat and edible meat offal	0.2	0.3	4%
64	Footwear, gaiters and the like, parts thereof	0.1	0.3	23%
'88	Aircraft, spacecraft, and parts thereof	0.8	0.2	-14%
'46	Manufactures of plaiting material, basketwork, etc.	0.4	0.2	-6%
'18	Cocoa and cocoa preparations	0.3	0.2	-2%
'90	Optical, photo, technical, medical, etc apparatus	0.2	0.2	2%
'85	Electrical, electronic equipment	0.2	0.2	3%
'37	Photographic or cinematographic goods	0.2	0.2	-2%
58	Special woven or tufted fabric, lace, tapestry etc	0.4	0.2	-5%
'89	Ships, boats and other floating structures	0.2	0.2	-5%
'45	Cork and articles of cork	0.2	0.1	-8%
'30	Pharmaceutical products	0.1	0.2	7%
42	Articles of leather, animal gut, harness, travel goods	0.1	0.2	2%
'13	Lac, gums, resins, vegetable saps and extracts nes	0.4	0.2	-9%
62	Articles of apparel, accessories, not knit or crochet	0.1	0.2	14%
61	Articles of apparel, accessories, knit or crochet	0.1	0.2	6%
43	Furskins and artificial fur, manufactures thereof	0.1	0.1	-3%
53	Vegetable textile fibres nes, paper yarn, woven fabric	0.2	0.1	-7%
55	Manmade staple fibres	0.1	0.1	1%
54	Manmade filaments	0.6	0.1	-16%
52	Cotton	0.1	0.1	1%
'92	Musical instruments, parts and accessories	0.1	0.1	9%
60	Knitted or crocheted fabric	0.1	0.1	3%
'91	Clocks and watches and parts thereof	0.0	0.1	12%
'95	Toys, games, sports requisites	0.0	0.1	1%
50	Silk	0.0	0.1	28%
'80	Tin and articles thereof	0.1	0.0	-18%

Source: International Trade Centre, UNCTAD

The country has managed to migrate from a comparative disadvantage in the manufacture of *Milling products*, *Soaps*, *Cereals*, *Miscellaneous edible preparations* and *Essential oils* to a comparative advantage in 2013. However, South Africa has lost its comparative advantage in *Miscellaneous chemicals*, *Fish, crustaceans* and *Copper*. Again, unsurprisingly, the RCA indices are highest for primary products.

To further explain the pattern of the country's specialisation, Figure 2.6 provides a picture of exports by industrialisation level. Not surprisingly, South Africa's export basket is concentrated in primary commodities, resource-intensive manufactures and low-technology-intensive manufactures. The country lost 2 per cent of high-tech, medium-tech (4 per cent) and low-tech (2 per cent) exports to resource-based exports in 2011.

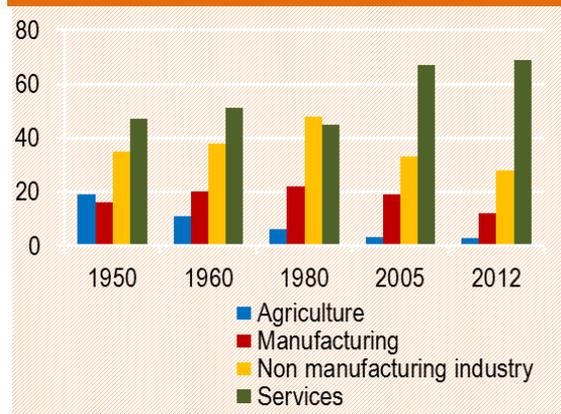
Figure 2.6
Exports by industrialisation level



Source: UNIDO

Decreases in exports of medium-tech and high-tech sectors led to a large decline in shares of manufacturing value added and employment in the same sectors. Figure 2.7 presents the changing importance of agriculture, industry, manufacturing and service sectors' shares in GDP at different points in time. The average share of manufacturing increased between 1950 and 1980, peaking at around 22 per cent in the 1980s. However, by 2005, there was process of deindustrialisation, with average share of manufacturing declined to 19 per cent in 2005 and finally to 12 per cent in 2012. The share of agriculture declined dramatically to 2.6 per cent in 2012. The one sector that has seen growth in the post-apartheid period is the tertiary sector, with growth between 1994 and 2012 in retail, telecommunications, financial services and security (also see Naude (2013)). The financial services sector however does not create large numbers of jobs, and these are high-skilled, in a context in which the unemployed are largely unskilled: an unfortunate mismatch. The low levels of employment in agriculture and its declining contribution have been noted, but in a context in which unskilled work is a major priority, limitations in the absorptive capacity of the agriculture sector pose a real problem for economic development.

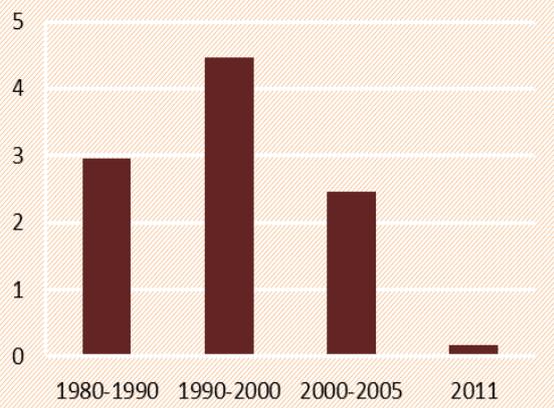
Figure 2.7
Gross value added (per cent of GDP at current prices)



Source: UNIDO

Finally, figure 2.8 shows a first impression of catch-up and falling behind in productivity. The country experiences very high levels of productivity before 2000, but its productivity performance plummeted from a peak of 4.5 per cent in 1990-2000 to 0.17 per cent in 2011. The lost decade had similar impacts on its industrial development. Productivity matters for the success of the country's industrialisation. Improving productivity means producing more from available resources.

Figure 2.8
Labour productivity growth, 1980-2011



Source: South African Reserve Bank and Statistics SA

The same pattern is seen in Latin America from the preceding chapter where changes in export composition reflect some growth-reducing structural change and de-industrialisation, following a shift in the production structure from agriculture towards services (and to a lesser extent, non-manufacturing industries), with manufacturing remaining unchanged and/or declined.

It is worth noting that while South Africa has opened up its market relatively more than Latin America and East Asia (these countries had similar structure prior to trade liberalisation), the economic impact between both South Africa and Latin America and Asia was radically different. In the country ranking according to the Competitive Industry Performance Index which benchmarks countries' ability to produce and export manufactured goods competitively (see Box 1), Singapore, Republic of Korea and China were among the countries that dominated the country rankings, both in 2000, 2005 and 2012 (see Table 2.5).

China made a significant gain in the CIP index ranking and climbed to seventh from 26th in 1995. Brazil (33rd), Mexico (22nd) and South Africa (41st) were worse off in 2012 compared to 1995. India has significantly improved its position and now ranks 43rd from 48th in competitive industrial performance.

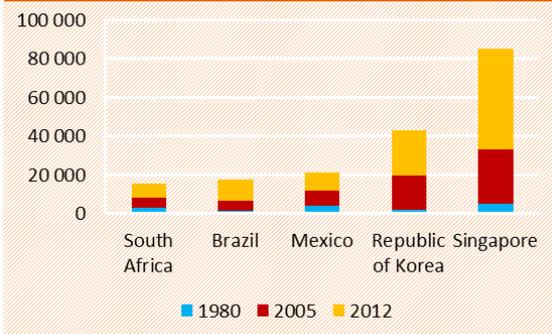
Table 2.5
The Competitive Industry Performance Index (CIP) ranking for selected countries

Country	1995	2000	2005	2012
Singapore	10	11	9	6
Republic of Korea	13	12	4	4
China	26	23	18	7
Mexico	21	19	22	22
Brazil	29	31	34	33
South Africa	37	42	39	41
India	48	52	52	43

Source: Adapted from UNIDO 2013

Differential patterns of structural change (and industrial production capabilities) also account for the bulk of the differences in the extent of country's economic prosperity. Figure 2.9 highlights the vast inequality that persists in GDP per capita. In 1980, South Africa's GDP per capita was 1.6 times greater than that of the Republic of Korea, but by 2012 the latter overtook the former by more than 3 times. The country that changed the structure of its trade saw far stronger GDP per capita growth than the one that did not.

Figure 2.9
GDP per capita at current prices in US Dollars for selected countries



Source: UN Statistics

Box 1: How the Competitive Industry Performance (CPI) Index is constructed (UNIDO 2012)

The CIP index combines four main dimensions of industrial competitiveness: industrial capacity, manufactured export capacity, industrialization intensity and export quality. Six quantitative indicators are used to measure these four dimensions:

(1) Industrial capacity. The CIP uses manufacturing value added (MVA) per capita as the basic indicator of a country's level of industrialization, adjusted for the size of the economy. It shows a country's capacity to add value in manufacturing. But the capacity to manufacture does not necessarily mean the capacity to manufacture competitively. Countries that have gone through a long period of protectionism and import substitution may have a substantial manufacturing capacity that is not globally competitive;

(2) Manufactured export capacity. In a globalizing world, the capacity to export is a key ingredient for economic growth and competitiveness. Manufactured exports per capita are used in the CIP as an indicator of the capacity of countries to meet global demands for manufactured goods in a highly competitive and changing environment. Manufactured exports show if national production is really competitive internationally;

(3) Industrialization intensity. The intensity of industrialization is measured by the simple average of two indicators: the share of manufacturing in GDP, and the share of medium- and high-technology activities in MVA. The former captures the role of manufacturing in the economy and the latter is a measure of the technological complexity of manufacturing. The CIP gives a positive weight to complex activities on the ground that a more complex structure denotes industrial maturity, flexibility and the ability to move to fast-growing activities. However, the indicator has some important limits imposed by the data. It only captures shifts across activities and not upgrading within them, thus missing an important aspect of technological improvement. It is also fairly aggregate and cannot capture fine technological differences within the categories (some low-technology activities may have elements of high technology and vice versa);

(4) Export quality. The quality of exports is measured by the simple average of two indicators: the share of manufactured exports in total exports, and the share of medium- and high-technology products in total exports.

The reasoning is similar to that for industrialization intensity. The share of manufactures in total exports captures the role of manufacturing in export activity, while the share of medium- and high-technology exports in total exports reflect technological complexity and the ability to make more advanced products and to move to more dynamic areas of export growth. The four dimensions are given equal weight. Thus each of the two indicators of the industrialization intensity and export quality get a weight of 1/2 in the aggregate CIP. All six indicators are standardized according to the formula:

$$I_{i,j} = \frac{X_{i,j} - \text{Min}(X_{i,j})}{\text{Max}(X_{i,j}) - \text{Min}(X_{i,j})}$$

Where $X_{i,j}$ is the value i of the country j , Min is the smallest value in the sample and Max the largest. The top country in the sample gets a 1 while the worst performing country gets a 0. The combined indices are simply calculated as the arithmetic mean of standardized values.

Who are the main drivers?

The main destinations for South African exports of goods are the EU, Japan, US, China and Africa (Figure 2.10-2.11). Overall, it is a tripolar pattern of Europe, Asia-Pacific and Africa. The biggest changes over the decade from 2005 have been with respect to EU (down 18 percentage points), Africa (up 14 percentage points), China (up 9 percentage points), Japan (down 5 percentage points) and US (down 4 percentage points). The concentration of exports in higher income countries reflects in part the industrial demand for precious metals and minerals by producers of high tech components and final goods.

South Africa is growing its exports in the two largest markets, Africa (31 per cent) and China (14 per cent) since 2010. The EU, US and Japan have reduced their demands for South Africa's goods. The recent global financial crisis appears to have had an impact.

Trade intensity indices (Table 2.6) provide another dimension on export market shares. They measure whether country i exports (imports) more, as a percentage, to (from) country j than the world does on average and takes a value between 0 and $+\infty$. Values greater (less) than 1 indicate an 'intense' bilateral trade relationship and implies bilateral trade flow that is larger (smaller) than expected, given the partner country's importance in world trade.

Here South Africa's trade is examined with respect to a group of emerging economies and a group of African trading partners. South Africa export and import intensity with its major trading partner, the EU, has declined over the period 2001-2012 while trade with China has intensified in the same period. In particular, South Africa's trade became more intensive than expected with China post-2008, making China, South Africa's second largest single trading partner in 2012. South Africa exports and imports more to the rest of Africa than the rest of the world as suggested by high trade intensities in 2012, reflecting Africa's growing importance in South Africa's trade. Within the BRICS, import and most importantly export intensity has declined quite substantially between South Africa and Brazil, while import intensity with India doubled

between 2001 and 2012. Trade intensity with Russia remains very low.

Positive balances were recorded only with Africa, Japan and the US.

Figure 2.10
Market share in key export destinations, 2005-2013

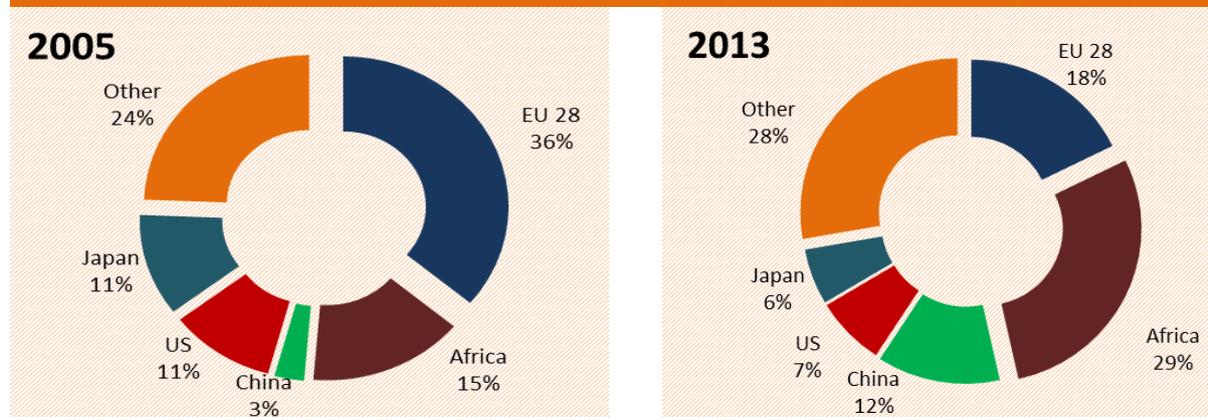
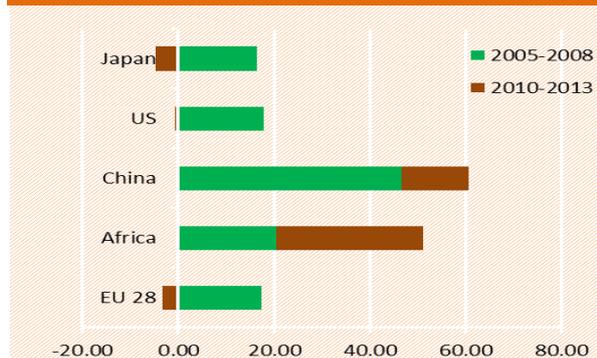


Figure 2.11
Average annual export growth rate, 2005-2013



Source: COMTRADE

South Africa's trade balance with its major partners is presented in Table 2.7 and Figure 2.11. While South Africa remains more open than its emerging market peers (i.e. BRICs), its merchandise trade balance remained in deficit from 2001 to 2013, widening from R0.2 billion in 2001 to R183.1 billion in 2013. On a sectoral level, manufacturing recorded the highest trade deficit, widening from R178 billion in 2012 to R244 billion in 2013 while the deficit in the services sector increased from R20 billion to R26 billion in the same period. Conversely, in spite of labour strikes in 2013, the mining sector recorded a trade surplus in the same period.

South Africa recorded negative merchandise trade balances with many of its trading partners, namely EU, China, Brazil and India.

Table 2.6
Trade intensity

Index	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012
BRIC- Brazil	1.15	1.04	0.87	0.88	0.95	1.01	0.93	0.82	0.64	0.84	0.70	0.74
Russian	0.17	0.25	0.31	0.29	0.16	0.18	0.16	0.20	0.24	0.26	0.19	0.27
India	1.71	1.70	1.24	1.30	1.84	1.01	1.34	1.56	1.78	1.79	1.41	1.57
China	0.45	0.42	0.51	0.43	0.46	0.61	0.94	0.82	1.29	1.23	1.38	1.16
Africa excl. SA	-	-	-	-	-	-	-	-	-	-	4.98	5.91
Japan	1.55	1.23	1.94	2.04	2.21	2.46	2.45	2.30	1.70	1.95	1.73	1.27
United States	0.72	0.56	0.70	0.69	0.62	0.72	0.81	0.80	0.69	0.76	0.72	0.68
EU27	0.94	1.00	0.89	0.90	0.93	0.91	0.84	0.84	0.72	0.76	0.67	0.63

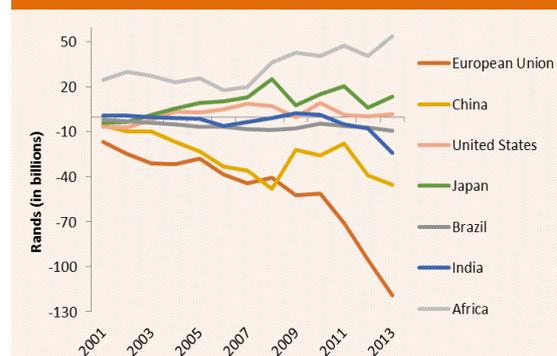
Source: International Trade Centre, UNCTAD

Table 2.7
Trade balance by sectors

R (billion)	2001	2005	2006	2007	2008	2009	2010	2011	2012	2013
Total Merchandise goods	-0.2	-30	-82	-88	-91	-34.7	-6	-35	-132	-183
Manufacturing	-8.5	-36	-69	-77	-70	-49.5	-50.6	-103	-178	-245
Agriculture	5	7.8	5.8	5.6	13.1	13.5	13.5	15.6	15.8	25.2
Mining	3	-2.4	-17	-16	-34	2.5	31.9	51.8	29	34.5
Services	-3.3	-5.2	-14	-19	-34	-23.3	-32.5	-35	-21	-26

Source: UNCTAD

Figure 2.13
Trade balance with the major partners



Source: UNCTAD

Conclusion

In sum, South Africa's widened exposure to the rest of the world has not in itself induced the necessary structural changes in the economy to significantly alter the export basket beyond the range of products that reflect South Africa's static comparative advantage. The RCA indices are still highest for mineral products. Unless an effort to deepen specialization is mustered, and over-reliance on traditional goods is tempered, the pace of structural change and industrialisation will remain slow, and the country will remain overexposed to trade shocks, and the inequality generating forces of international asymmetries will not be tamed.

The country needs to build its industrial development strategies around developing its relative advantages. We observe that some of the products in which it has comparative disadvantages (such as plastics, electrical equipment etc.) are among the top exports, calling for synergies between industrial policy and trade.

We observe that many South African value-added exports are destined exclusively to their neighbours rather than towards developed countries. Thus, integration of national market in Africa can help the country hasten its structural transformation and seize opportunities to advance on industrial development. At the same time, trade opening should address the structural problems that are constraining competitiveness while improving productivity, logistics, and skills development.

Chapter 3

Impact of BRIC's expanding consumption on SA trade

The last two decades have seen an important change in the global economic landscape, a shift in wealth, led by China, India, Brazil and Russia (often referred to as BRIC). These economies are among the world's top 10 largest middle class consumers, with over USD 25 trillion projected to be spent by 2030 (Kharas, 2011). The expansion of the middle class is likely to result in an increase in demand for higher value added goods. Some developed economies' food companies have already modified their products, either to cater to Asian consumers' tastes (The Economist, 2013) or to make them more sophisticated. The growing number of relatively wealthy consumers in these emerging countries will open up new opportunities and expand trade over the period ahead.

Meanwhile, in 2010, South Africa was invited to join the group, which was then referred to as BRICS. The country has also seen greater trade intensity with this group, particularly with China and India in the recent decade as observed in chapter 2. This relationship has the potential of becoming a key source of economic transformation and sustainable development if monitored closely to ensure that the country makes the most of the benefits stemming from it.

In this chapter, we consider some of the products and markets the country can take on so as to maximise the opportunities or potential gains inherent in BRIC's trade. Data is taken from COMTRADE unless otherwise stated.

BRICS economic outlook

The BRICS economies are estimated to have accounted for about 28 per cent of the world's gross domestic product (GDP) at purchasing power parity (PPP) in 2013. This sizeable

impact on the global economy is expected to continue over the period ahead.

According to the International Monetary Fund (IMF) 2014 projections, world economic growth will increase from 3.3 per cent in 2013 to 3.9 per cent in 2015. The global economy is expected to grow around 4 per cent until 2017. Emerging markets including developing countries are projected to record higher growth rates compared to the world economy average. The outlook for emerging markets remains positive, with projected economic growth of 4.4 per cent in 2014, up to 5.2 per cent in 2017 (see table 3.1).

Table 3.1
BRICS GDP growth outlook 2013-2017

Region/country	2013	2014	2015	2016	2017
World	3,28	3,31	3,85	4,04	4,07
Emerging markets and developing economies	4,74	4,43	4,95	5,19	5,23
Brazil	2,49	0,30	1,39	2,23	2,69
Russia	1,30	0,24	0,51	1,50	1,80
India	5,02	5,63	6,35	6,46	6,63
China	7,70	7,38	7,09	6,84	6,63
South Africa	1,89	1,40	2,30	2,80	2,70

Source: World Economic Outlook (IMF), October 2014

Within BRICS, China and India are projected to grow by over 6 per cent between 2015 and 2017. Russia, Brazil and South Africa are projected to have modest growth of an average of over 2 per cent over the same period.

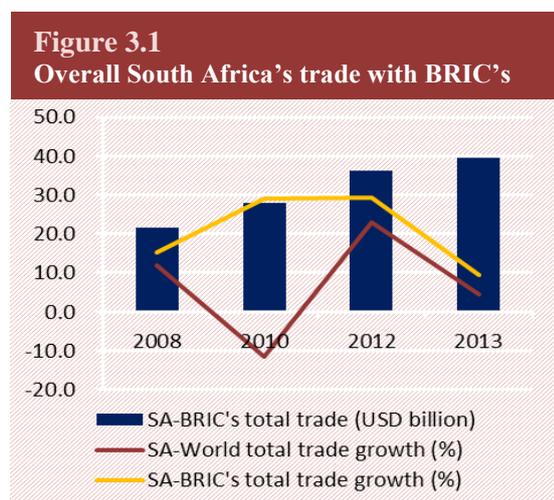
The global outlook presents both opportunities and risks for South Africa. The recovery in the global economy will translate into moderately higher demand for South African exports especially primary products to advanced economies and some of the emerging economies. On balance, the South African economy continues to draw strength from emerging-market trends. Slowing growth in China may lower the prices of South Africa's commodity exports. However, rising Chinese wages, along with regulatory reform in India

and investment expansion in Russia, provides new opportunities for South African firms to export manufactured goods.

South Africa-BRIC trade

The successful experience of the BRIC and other emerging economies over the past half century has simply demonstrated that trade can be an important stimulus to structural transformation and sustainable development (as already discussed in chapter 1). Their external trade (exports plus imports) has surged to about US\$ 5 trillion (or 15 per cent of the world's total) in 2013 from US\$ 3 trillion in 2007. Total demand by BRIC's (or imports) accounted for 16 per cent of world's total in 2013, affording a substantial market for goods.

South Africa's trade response has been strong, trade with BRIC has grown faster than with any other countries and/or regions in the world (after Africa), increasing by more than 30 per cent since its inclusion in 2010 to US\$ 39.5 billion in 2013 (figure 3.1). The sluggish pace of the country's trade growth in 2013 was due to slower global recovery and uncertainty in advanced economies which affected emerging economies.



However, most such trade is in primary commodities, resource-intensive and low-technology-intensive goods with few linkages to the rest of the economy (as already observed in chapter 2). China and India remain the main destinations for more than 80 per cent of the South Africa's exports in 2013. The overall

value of South Africa's exports to Brazil and Russia has remained relatively low (table 3.2).

Table 3.2
Intra-BRICS trade 2013 (USD billion)

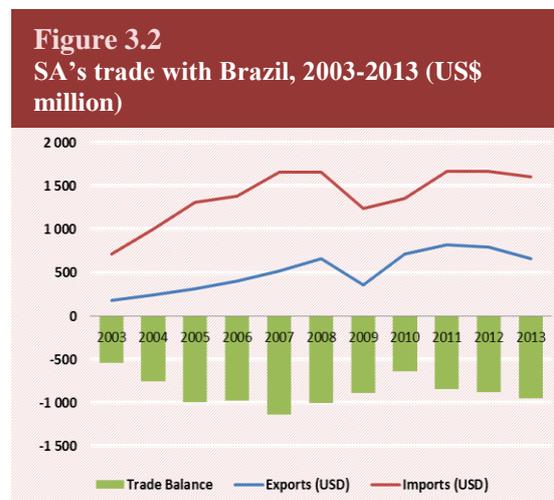
Destination	Source					BRICS
	Brazil	Russia	India	China	South Africa	
Brazil		2.67	6.40	35.90	0.72	45.69
Russia	2.97		3.10	49.60	0.40	56.08
India	3.83	3.81		48.40	3.00	59.04
China	46.03	35.90	16.97		12.10	111.00
Africa	1.84	0.38	5.74	16.83		24.79
BRICS	54.67	42.76	32.21	150.73	16.22	296.59

South Africa has to capitalise on its inclusion in BRICS to develop sectors that have potential in transforming the economy, increase the quality of products and move up the value chain. We now turn to evaluate South Africa's trade with each of the BRIC's country in order to identify respective priority sectors that could be targeted.

South Africa-Brazil trade

Trade trends

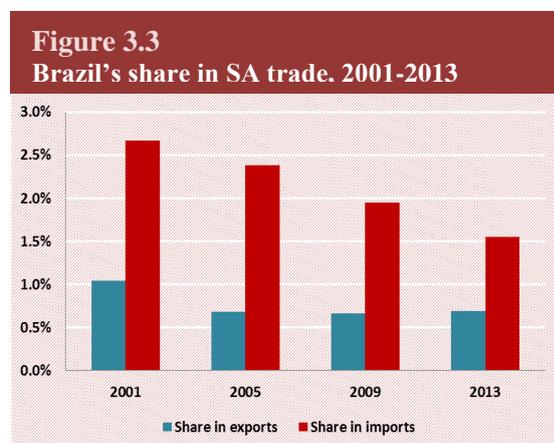
South Africa's merchandise exports and imports from Brazil have been gradually increasing since 2003 (except for 2009, 2012 and 2013). However, the increase in imports remains 3 times greater than that of the exports on average (figure 3.2). This disparity is reflected in the country's trade balance, which has been consistently negative, only narrowed to less than US\$ 650 million in 2005 and 2010.



In 2013 alone, South Africa's exports to Brazil declined by US\$ 130 million despite the higher import demand from Brazil amounting to US\$ 16 billion in that year. This indicates that Brazil is now sourcing part of the country's export products from alternative sources.

Brazil's market share

The relationship between the value of the exports to Brazil and their relative share of South African global exports stayed below 1% since 2005. The share of Brazilian imports relative to South Africa's global imports has been declining since 2001 (figure 3.3).



Main products exported to Brazil by SA

Just as the relative importance of South Africa in international trade has shifted over time, so has the mix of traded goods. South Africa's exports to Brazil grew on average by 8.37 per cent per annum (compound annual growth) between 2007 and 2010 from US\$ 520 million to US\$ 717 million. However, exports declined on average by 1.94 per cent between 2010 and 2013 (see table 3.3). The 2007 to 2010 period reflects largely the pre-inclusion in BRIC for South Africa and the period 2010-13 is the post-inclusion in BRIC. Within the top 10 export products to Brazil, only 4 are primary commodities namely iron and steel, mineral fuels, ores and aluminium. The remainder of the exports are manufactured products which show that South Africa's trade with Brazil is concentrated in manufactured goods. The top 10 products accounted for 77 per cent of all exports to Brazil in 2007 and this increased to 89 per cent in 2013.

Plastic products, chemical products, iron and steel and minerals are the leading export products to Brazil in 2013. Between 2007 and 2013, the share of plastic (chemical) products exported to Brazil increased dramatically from 0.45 per cent or US\$ 2.4 million (3.97 per cent or US\$ 20.6 million) to 17.2 per cent or US\$ 114 million (15.37 per cent or US\$ 102 million). The notable increase in exports of plastics and chemicals in 2013 was also supported by the gradual increase in the share of total exports of both products by South Africa to the rest of the world. Brazil accounted for almost 8 per cent (11 per cent) of the country's total exports of plastics (chemicals) in 2013 compared to 0.4 per cent (3 per cent) in 2007. However, the market for iron and steel, although still among the top 4 exports to Brazil, shrank in 2013.

In terms of export growth, only plastic products, chemical products and vehicles were amongst the top 10 exports witnessed positive annual growth between 2010 and 2013. However, at 29 per cent, export growth in plastic products slowed during the period 2010-2013 compared to 103 per cent witnessed in 2007-2010. The remaining two products experienced significant export growth since 2007. Although its market remained relatively small, notice the impressive export growth in vehicles between 2007 and 2013. This suggests that the decline in South Africa's total exports to Brazil in 2013 could be driven by slowing export growth in iron and steel, mineral fuels, organic chemicals, aluminium, machinery and ores. For instance, exports of iron and steel (predominately ferro-alloys and ferro-manganese) have been gradually sliding from US\$ 135.1million in 2007 to US\$ 92.6million in 2013.

Revealed Comparative Advantage

Having identified the top export industries, the next step is to evaluate which of the industries South Africa has comparative advantage with respect to Brazil. The RCA is based on the assumption that the product pattern of trade is a clear proof of the international differences in their relative costs including non-price factors used in their production. Based on 2013, Table 3.4 shows that South Africa has comparative advantage in chemical products, explosives and iron and steel among others.

Table 3.3
South Africa's top export industries and products to Brazil, 2007-2013 (US\$ million)

Product code	Product label	2007		2010		2013		CAGR %	
		Value	Share	Value	Share	Value	Share	2007-10	2010-13
TOTAL	All products	520		717,1		663,1		8,37%	-1,94%
'39	Plastics and articles thereof	2,4	0,5%	40,7	5,7%	114,1	17,2%	103,93%	29,35%
'38	Miscellaneous chemical products	20,6	4,0%	26,6	3,7%	101,9	15,4%	6,61%	39,85%
'72	Iron and steel	135,1	26,0%	121,5	16,9%	92,6	14,0%	-2,63%	-6,56%
'27	Mineral fuels, oils, distillation products	50,9	9,8%	118,1	16,5%	78,7	11,9%	23,42%	-9,63%
'29	Organic chemicals	69,1	13,3%	84,7	11,8%	61,2	9,2%	5,23%	-7,81%
'76	Aluminium and articles thereof	23,4	4,5%	73,5	10,2%	48,5	7,3%	33,14%	-9,89%
'84	Machinery, nuclear reactors, boilers	59,6	11,5%	119,5	16,7%	32,3	4,9%	19,01%	-27,88%
'26	Ores, slag and ash	26,2	5,0%	29,6	4,1%	18,3	2,8%	3,09%	-11,32%
'87	Vehicles other than railway, tramway	10,0	1,9%	3,6	0,5%	17,0	2,6%	-22,58%	47,40%
'40	Rubber and articles thereof	0,9	0,2%	14,3	2,0%	13,0	2,0%	97,65%	-2,35%
'31	Fertilizers	0,3	0,1%	0,7	0,1%	12,7	1,9%	19,14%	108,60%
	Total Top Exports	398,5	76,7%	632,8	88,2%	590,3	89,0%		

Table 3.4
Revealed Comparative Advantage Indices for SA exports to Brazil, 2002-2013

Product Code	Product Label	2002	2008	2013	% change (CAGR)	
					2002-08	2008-13
'38	Miscellaneous chemical products	14.11	2.20	15.17	-23%	38%
'36	Explosives, pyrotechnics, matches, pyrophorics, etc	1.54	7.57	13.96	26%	11%
'76	Aluminium and articles thereof	4.79	2.93	7.91	-7%	18%
'72	Iron and steel	5.78	9.01	6.40	7%	-6%
'41	Raw hides and skins (other than furskins) and leather	0.06	0.02	5.64	-12%	150%
'39	Plastics and articles thereof	0.08	1.43	5.32	51%	25%
'31	Fertilizers	0.32	0.31	5.13	0%	60%
'59	Impregnated, coated or laminated textile fabric	7.38	0.26	4.26	-38%	59%
'29	Organic chemicals	1.90	5.58	3.69	17%	-7%
'05	Products of animal origin, nes	5.10	2.27	3.25	-11%	6%
'28	Inorganic chemicals, precious metal compound	14.78	0.78	2.06	-34%	18%
'26	Ores, slag and ash	5.96	10.20	1.99	8%	-24%
'81	Other base metals, cermets, articles thereof	2.87	1.68	1.98	-7%	3%
'67	Bird skin, feathers, artificial flowers, human hair	0.78	0.80	1.92	0%	16%
'40	Rubber and articles thereof	0.31	0.24	1.74	-4%	39%
'22	Beverages, spirits and vinegar	0.81	1.21	1.59	6%	5%
'32	Tanning, dyeing extracts, tannins, derivs, pigments	0.00	0.40	1.49	undef	25%
'57	Carpets and other textile floor coverings	1.44	1.41	1.24	0%	-2%
'86	Railway, tramway locomotives, rolling stock, equipment	2.43	1.35	1.22	-8%	-2%
'70	Glass and glassware	0.53	0.88	1.13	7%	4%

Chemical products top the list and more importantly it is the second largest export in 2013. There is therefore a greater alignment of export value and comparative advantage for chemical products. In contrast, plastic products have the highest export value as discussed above, but is ranked sixth in terms of revealed comparative advantage. It is worth noting that

while South Africa in 2002 had comparative disadvantage in plastics, beverage, raw hides, fertilizers, bird skin, tanning products as well as glass and glassware, it managed to turn its fortunes in 2008 and 2013, although some of these products do not feature in the top 10 export products for 2013.

South Africa is losing ground (though they still have comparative advantage) in railway equipment, organic chemicals, textile and ores where its comparative advantage is sliding. More worrying are product categories where South Africa has lost its comparative advantage between 2002 and 2013 – these products include tools, implements, mineral fuels, salt, sulphur etc., paper and paperboard, aircraft, spacecraft etc., vegetable plaiting, manmade filaments, nickel and zinc.

Identification of trade opportunities in manufactured products

Structural change is enhanced if South Africa expands its exports in value added products compared to focussing in resource based products. The key objective here is to identify **manufactured** products which South Africa can exploit depending on whether it has **comparative advantage** on those products. To assist in identifying opportunities for manufactured products that can help to achieve structural change and prevent industrial decline, we employed similar framework used in Chapter 2 (see table 2.3), but this time divide export products into four groupings (rising opportunities, lost opportunities, falling opportunities, limited opportunities) according to the following criteria.

- **Rising opportunities:** South Africa exports dynamic manufactured products where growth in partner's demand is faster than the average, and increases its market share. This is the best case scenario.
- **Lost opportunities:** South Africa exports dynamic manufactured products, but loses market share.
- **Falling opportunities:** South Africa export manufactured products for which partner's demand is growing at less than the average, but nonetheless increases the market share.
- **Limited opportunities:** South Africa export manufactured products for which partner's demand are growing at less than the average, and is losing market share. This is the worst case scenario.

The share of South Africa exports is derived from total exports for product 1 to country 1 compared with what country 1 is importing of product 1. Products that fall under rising and lost opportunities are dynamic products given the consistency in the partner's demand growth rate over the years. We now attempt to use the framework identified above to detect manufactured products that South Africa can take advantage of. It should be noted that only manufactured products in which South Africa has comparative advantage with Brazil are considered. As a result, although vehicles and machinery are amongst the top 10 exports, they are not considered because South Africa does not have comparative advantages in these products with respect to Brazil. The results are presented in table 3.5.

South Africa witnessed rising export opportunities in two manufactured products, miscellaneous chemicals (predominantly insecticides, fungicides herbicides packaged for retail sale) and impregnated, coated or laminated textile fabric (although with decreasing level of competitiveness). Brazil's demand for these products in 2013 grew faster than the average (2011-2013) and South Africa managed to capture a portion of the increasing demand. This provides an opportunity to expand exports further.

However, while the market share for plastics and fertilizers have increased, the demand for the products by Brazil have declined, and given the modest economic growth projection for Brazil, South Africa may continue to expect less than average growth in Brazil's demand (or falling opportunities) for these products in the near future. Moreover, the country witnessed limited export opportunities with respect to organic chemicals, rubber and glass and glassware.

Table 3.5
Export opportunities for SA manufactured products to Brazil (%)

Sector	Growth in Brazil's demand		SA's market share		RCA	Eport opportunities
	2011-2013	2013	2011	2013	2013	
Plastics	11.4	11.1	1.0	1.3	Increasing	Falling opportunities
Miscellaneous chemical products	18.6	22.5	1.7	2.0	Increasing	Rising opportunities
Organic chemicals	8.4	8.3	0.8	0.6	Decreasing	Limited opportunities
Rubber	7.4	4.7	0.6	0.3	Increasing	Limited opportunities
Fertilizers	27.4	3.5	0.0	0.1	Increasing	Falling opportunities
Impregnated, coated or laminated textile fabric	4.5	5.2	0.1	1.2	Decreasing	Rising opportunities
Glass and glassware	12.9	6.3	1.3	0.3	Increasing	Limited opportunities

Main products imported from Brazil

Amongst the top 10 imported products from Brazil, five are primary products namely iron and steel, zinc, ores and aluminium. The remainder of the imports are manufactured products (see table 3.6). South Africa's imports from Brazil grew on average by 4.4 per cent annually between 2010 and 2013 from US\$ 1.35 billion million to US\$ 1.6 billion. Despite this increase, the levels of imports are yet to reach a peak experienced in 2007 before the global recession. Sugar and sugar confectionary is still the most important imported product from Brazil – it grew annually by 43 per cent between 2010 and 2013. South Africa imported just over 36 per cent of its sugar and sugar confectionary from Brazil.

Meat and edible meat offal predominately poultry is the third largest imported product from Brazil but there was a decline (2.8 per cent annually) between 2010 and 2013 possibly due to the changes in the tariff structure. The top 10 imported products accounted for 73 per cent of all imports in 2007 and this increased to 77 per cent in 2013 showing more concentration in South Africa's imports.

A closer look at exports and imports reveals that ores, slag and ash; aluminium and articles thereof; iron and steel; zinc and articles thereof; and mineral fuels, oils, distillation products are both present in the major exports and imports from Brazil.

Table 3.6
South Africa's top imports from Brazil, 2007-2013 (value in US\$ million)

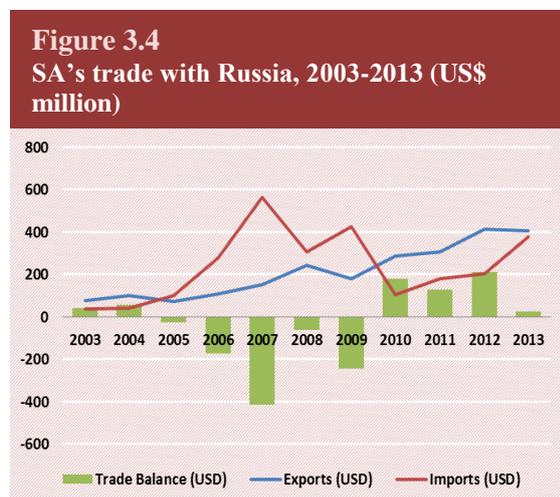
Product code	Products	2007		2010		2013		2010-13
		Value	Share	Value	Share	Value	Share	CAGR
TOTAL	All products	1 659		1 354		1 607		4,40%
'99	Commodities not elsewhere specified	425	25,6%	306	22,6%	312	19,4%	0,5%
'17	Sugars and sugar confectionery	49	3,0%	47	3,5%	195	12,1%	43,0%
'02	Meat and edible meat offal	175	10,5%	179	13,2%	160	10,0%	-2,8%
'84	Machinery, nuclear reactors, boilers	162	9,8%	132	9,7%	144	9,0%	2,1%
'85	Electrical, electronic equipment	108	6,5%	78	5,8%	78	4,9%	0,0%
'87	Vehicles other than railway, tramway	173	10,4%	121	8,9%	76	4,7%	-11,1%
'26	Ores, slag and ash	37	2,2%	51	3,8%	70	4,4%	8,2%
'10	Cereals	0,321	0,0%	29	2,1%	65	4,0%	22,4%
'76	Aluminium and articles thereof	6	0,4%	13	1,0%	36	2,2%	27,9%
'72	Iron and steel	69	4,2%	24	1,8%	35	2,2%	9,4%
'79	Zinc and articles thereof	0.023	undef	0.050	undef	34	2,1%	409,0%
'27	Mineral fuels, oils, distillation products	9	0,5%	13	1,0%	32	2,0%	25,0%

Using Harmonised Commodity Description and Coding Systems at 6 digit level (HS6), reveals that the differences in the products being imported and exported. For instance, imports for ores are largely iron ores and concentrates and mineral fuels comprise petroleum coke, petroleum bitumen and other residues of petroleum oils or of oils obtained from bituminous mineral

South Africa-Russia trade

Trade trends

South Africa's merchandise export to Russia has been gradually increasing from under US\$ 75.2 million in 2003 to US\$ 178.4 million in 2009. Since the inclusion of South Africa in BRICs, exports substantially increased from US\$ 284 million in 2010 to US\$ 403 million in 2013 (see figure 3.4). Exports declined in 2009 because of the global recession. Imports on the other hand have been fluctuating over the period with a peak experienced in 2007. Since 2010, imports have been gradually increasing, albeit at a slower pace compared to exports, which culminated in the country's positive trade balance since 2010.



Russia's market share

The relationship between the value of the exports to Russia and their relative share of South African global exports remained below 0.5 per cent since 2001. This indicates that Russia is not a significant export destination for South Africa. On the other hand, the share of Russia's imports relative to South Africa's

global imports has been declining from 2.7 per cent from 2001 to 1.6 per cent in 2013. Overall, trade between SA and Russia account for less than 2.8 per cent of the global trade in 2001 and this declined to almost 2 per cent in 2013 (see figure 3.5).



Main products exported to Russia by SA

After a significant growth of 17.1 per cent between 2007 and 2010, South Africa's exports to Russia declined thereafter to 9.3 per cent in 2010-2013. The key exports have always been edible fruit and vehicles (see table 3.7). The top 10 exports accounted for 86.6 per cent of all exports to Russia in 2007 and this increased to 96.1 per cent in 2013 indicating increasing trade concentration.

Between 2007 and 2013, the share of vehicles exported to Russia increased dramatically from 0.3 per cent or US\$ 0.5 million to 18.5 per cent or US\$ 75 million. Edible fruits accounted for 38.23 per cent of the total exports to Russia in 2013 down from 46.52 per cent in 2007. Russia accounted for almost 6 per cent (1 per cent) of the country's total exports of edible fruits (vehicles) in 2013 compared to 5 per cent (0 per cent) in 2007.

Although its market remained relatively small, impressive export growth has been witnessed in vehicles and beverages, spirits and vinegars between 2007 and 2013. The decline in South Africa's total exports to Russia in 2013 could be driven by slowing export growth (in edible fruits and vegetables) as well as negative growth (in ores, electrical equipment and aluminium) between 2010 and 2013.

Table 3.7
South Africa's top exports to Russia, 2007-2013 (US\$ million)

Product code	Product label	2007		2010		2013		2007-10	2010-13
		Value	Share	Value	Share	Value	Share	CAGR	CAGR
TOTAL	All products	150,9		284,1		405,7		17,10%	9,30%
'08	Edible fruit, nuts, peel of citrus fruit, melons	70,2	46,52%	144,6	50,90%	155,1	38,23%	19,80%	1,80%
'87	Vehicles other than railway, tramway	0,45	0,30%	1,7	0,60%	75,2	18,54%	40,70%	156,30%
'26	Ores, slag and ash	7,7	5,10%	50,2	17,67%	42,8	10,55%	59,90%	-3,90%
'84	Machinery, nuclear reactors, boilers	8,5	5,63%	12,1	4,26%	27,5	6,78%	9,40%	22,70%
'22	Beverages, spirits and vinegar	6,4	4,24%	7,8	2,75%	26,5	6,53%	5,10%	35,90%
'72	Iron and steel	17	11,27%	8,8	3,10%	25,8	6,36%	-15,20%	31,00%
'85	Electrical, electronic equipment	8	5,30%	27,7	9,75%	16,2	3,99%	36,30%	-12,60%
'20	Vegetable, fruit, nut	6,6	4,37%	12,1	4,26%	13,1	3,23%	16,40%	2,00%
'25	Salt, sulphur, earth, stone, plaster, lime and cement	0,8	0,53%	1,5	0,53%	4,9	1,21%	17,50%	33,70%
'76	Aluminium	5	3,31%	8,3	2,92%	2,9	0,71%	13,50%	-22,80%
	Top 10 products	130,65	86,6%	274,8	96,7%	390	96,1%		

Table 3.8
Revealed Comparative Advantage Indices for SA exports to Russia, 2002-2013

Product code	Product label	RCA			% Change (CAGR)	
		2002	2008	2013	2002-08	2008-13
'08	Edible fruit, nuts, peel of citrus fruit, melons	87.28	91.46	70.93	1%	-4%
'22	Beverages, spirits and vinegar	2.19	10.23	10.58	25%	1%
'20	Vegetable, fruit, nut, etc food preparations	9.66	8.72	9.53	-1%	1%
'26	Ores, slag and ash	0.00	6.89	7.61	undef	2%
'43	Furskins and artificial fur, manufactures thereof	0.21	2.58	5.14	43%	12%
'25	Salt, sulphur, earth, stone, plaster, lime and cement	0.03	0.55	4.72	54%	43%
'72	Iron and steel	3.81	2.99	2.92	-3%	0%
'87	Vehicles other than railway, tramway	0.12	0.50	2.50	22%	31%
'06	Live trees, plants, bulbs, roots, cut flowers etc	1.08	0.09	1.34	-29%	56%
'79	Zinc and articles thereof	0.00	1.77	1.32	undef	-5%
'35	Albuminoids, modified starches, glues, enzymes	0.43	0.19	1.29	-11%	37%
'76	Aluminium and articles thereof	0.00	1.97	0.78	undef	-14%
'28	Inorganic chemicals	0.07	0.28	0.65	22%	15%
'84	Machinery, nuclear reactors, boilers, etc	0.98	1.79	0.60	9%	-17%

Revealed Comparative advantage

Edible fruits top the list (although the comparative advantage is declining) and more importantly it is the largest export in 2013. In contrast, vehicles have the second highest export value as discussed above, but is ranked eighth in terms of revealed comparative advantage (see table 3.8). The country has managed to migrate from a comparative disadvantage in the manufacture of vehicles, ores, salt, zinc, albuminoids (including starches, glues and enzymes) and furskins to a comparative advantage in 2013. However,

South Africa has lost its comparative advantage in coffee, miscellaneous chemicals, optical, photo, medical apparatus, furniture, sugars and sugar confectionary, residues, photographic or cinematographic goods, manufactures of plaiting and manmade staple fibres.

Table 3.9
Export Opportunities for SA Manufactured Products to Russia (%)

Sector	Growth in Russia's demand		SA's market share		RCA 2013	Eport opportunities
	2011-2013	2013	2011	2013		
Beverages	20.5	13.4	0.4	0.8	Increasing	Falling opportunities
Furskins and artificial fur	49.3	22.8	0.6	0.5	Increasing	Limited opportunities
Salt, sulphur etc.	37.9	41.9	0.2	0.3	Increasing	Rising opportunities
Vehicles	48.3	17.8	0.1	0.2	Increasing	Falling opportunities
Albuminoids, modified starches, glues, enzyme	14.7	8.3	0.0	0.1	Increasing	Falling opportunities
Inorganic chemicals	15.6	13.5	0.0	0.1	Increasing	Falling opportunities
Machinery	28.7	11.9	0.0	0.0	Decreasing	Limited opportunities

Identification of trade opportunities in manufactured products

We follow the same framework discussed above to identify export opportunities for manufactured products.

South Africa experienced rising export opportunities in one manufactured product, salt, sulphur, etc. (predominantly cements, portland, aluminous, slag, supersulfate and similar hydraulic), although this did not feature in the top 10 export list. Russia's demand for this product grew 1.1 times more than the average in 2013 and South Africa managed to capture 0.1 per cent of the increasing demand. The country has also gained more comparative advantage. This provides an opportunity to expand exports further.

However, while the market share for beverages (mainly wine), vehicles, albuminoids and inorganic chemicals have increased, the demand for the products by Russia has declined, and given the modest economic growth projection for Russia, South Africa may continue to expect less than average growth in Russia's demand (or falling opportunities) for these products in the near future. Moreover, the country witnessed limited export opportunities with respect to foreshins and machinery.

Main products imported from Russia

Amongst the top 10 imported products from Russia, three are primary products namely copper, iron and steel and mineral fuels (see table 3.10 overleaf). The remainder of the imports are manufactured and agro-processing products. South Africa's imports from Russia declined by 34 per cent annually between 2007 and 2010 and gradually recovered between

2010 and 2013 but have not reached the 2007 levels. Imports from Russia only accounted for 0.4 per cent of all imports by South Africa in 2013. Mineral fuels including petroleum oils and oils obtained from bituminous minerals and crude contributed 29 per cent of all imports from Russia.

South Africa-India trade

Trade trends

South Africa's merchandise exports to India have increased significantly from US\$ 380 million in 2003 to US\$ 2.1 billion in 2009. After the inclusion of South Africa in BRIC exports increased from almost US\$ 3 billion in 2010 and reached a peak of just under US\$ 3.6 billion in 2012 before reducing to close to US\$ 3 billion in 2013 (see figure 3.6). It is worthwhile to note that the trade balance worsened from 2011 to 2013 after the inclusion of South Africa into BRIC due to increase in imports over exports. This, to some extent might indicate that India benefited much more from South Africa's inclusion in BRIC though there are other factors at play.

Figure 3.6
South Africa's trade with India, 2003-2013
(US\$ billion)

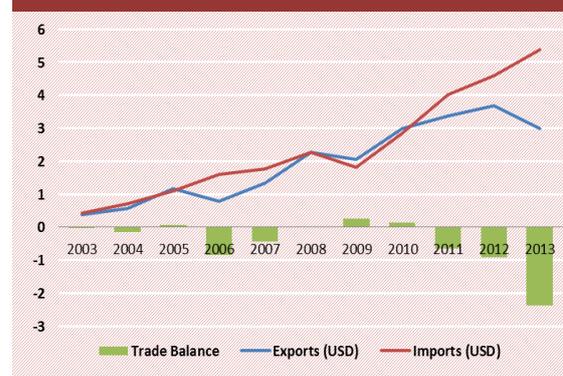
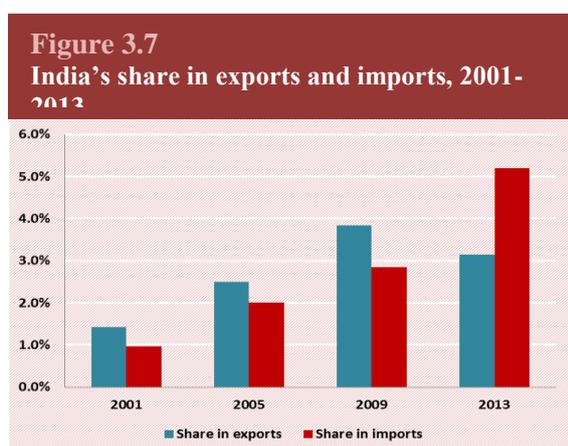


Table 3.10
South Africa's top imports from Russia, 2007-2013 (values in US\$ thousands)

Product Code	Product label	2007		2010		2013		2007-10	2010-13
		Value	Share	Value	Share	Value	Share	CAGR	CAGR
TOTAL	All products	564 541		105 434		377 954		-34%	38%
'27	Mineral fuels, oils, distillation products	434 406	76,95%	9 735	9,23%	109 724	29,03%	-61%	83%
'10	Cereals	-	0,00%	-	0,00%	7 1851	19,01%	-	-
'31	Fertilizers	762	0,13%	21371	20,27%	64 003	16,93%	130%	32%
'74	Copper and articles thereof	13 843	2,45%	18 098	17,17%	42 086	11,14%	7%	23%
'40	Rubber and articles thereof	1004	0,18%	4 605	4,37%	19 245	5,09%	46%	43%
'24	Tobacco and manufactured tobacco substitutes	-	0,00%	1	0,00%	11211	2,97%	-	929%
'72	Iron and steel	27 862	4,94%	2 803	2,66%	8 205	2,17%	-44%	31%
'90	Optical, photo, technical, medical	951	0,17%	893	0,85%	7 301	1,93%	-2%	69%
'28	Inorganic chemicals, precious metal compound, isotopes	438	0,08%	591	0,56%	6 174	1,63%	8%	80%
'71	Pearls, precious stones, metals, coins	38 015	6,73%	6 646	6,30%	6 084	1,61%	-35%	-2%
'84	Machinery, nuclear reactors, boilers	1341	0,24%	2 542	2,41%	4 586	1,21%	17%	16%
	Top 10 Products	518 622	91,9%	67 285	63,8%	350 470	92,7%		

India's market share

The relationship between the value of the exports to India and their relative share of South African global exports ranged from 1.2 per cent in 2001 to 3.84 per cent in 2009 and declined to 3 per cent in 2013 (figure 3.7). On the other hand, the share of India's imports relative to South Africa's global imports has been increasing from less than 1 per cent in 2001 to 2.84 per cent in 2009. Since South Africa joined the BRIC countries in 2010, imports share increased further to 5.2 per cent in 2013.



Main products exported to India by SA

South Africa is currently India's second largest trading partner in Africa. South Africa's exports to India have been steadily increasing year on year with the exception of a few years (2006, 2009 and 2013) where marginal declines were experienced (see table 3.11).

Exports achieved a compounded annual growth rate of 0.4 per cent between 2010 and 2013 down from 21.9 per cent in 2007-2010. Among the top 10 export products to India, 6 are primary commodities namely minerals, iron and steel, ores, aluminium, pearls and wool. The remainder of the exports are manufactured products and is an indication that South African trade with India is less concentrated in manufactured goods.

More than half of exports to India (53.6 per cent to be precise) in 2013 were in the mineral fuels industry. Significant contributions to the US\$ 1.6 billion in the mineral fuels came from coal, briquettes and bituminous coal. India accounted for almost 16 per cent of the country's total exports of minerals in 2013 compared to 7 per cent in 2007.

Although its market remained relatively small, notice the impressive export growth in aluminium and pulp of wood between 2007 and 2013. These are the only products that have recorded export growth between 2007 and 2013. Machinery, nuclear reactor and boilers; organic chemicals; tanning and ores managed to sustain its growth trajectory between 2007 and 2013. Negative export growth is witnessed for minerals, inorganic chemicals, pearls and wool.

Revealed Comparative Advantage (RCA) with India

Wool and animal hair top the list and its increasing; although it is the least in the top 10

exports in 2013 (table 3.12). We also observe that while South Africa in 2002 had comparative disadvantage in tanning, glassware, salt (including sulphur, earth, plaster, lime and cement) and lead, it managed to turn its fortunes in 2013, although some of these products do not feature in the top 10 export products for 2013.

Declining revealed comparative advantage from 2002 to 2013 has been observed in pulp of paper (from 23.56 to 9.89); inorganic chemicals (from 35.32 to 6.91); aluminium (from 7.01 to 4.16) and zinc (from 5.57 to 1.80). Unfortunately, the country lost its comparative advantage in organic chemicals, explosives, railway equipment, nickel, paper and paperboard, and other base metals over the same period.

Table 3.11
South Africa's top exports to India, 2007-2013 (US\$ million)

Product code	Product label	2007		2010		2013		2007-10	2010-13
		Value	Share	Value	Share	Value	Share	CAGR	CAGR
TOTAL	All products	1 349		2 980		3 025		21,90%	0,40%
'27	Mineral fuels, oils	447	33,14%	1774	59,53%	1621	53,59%	41,20%	-2,20%
'72	Iron and steel	143	10,60%	271,7	9,12%	366	12,10%	17,40%	7,70%
'26	Ores, slag and ash	50	3,71%	244	8,19%	287	9,49%	48,60%	4,10%
'28	Inorganic chemicals	208	15,42%	202	6,78%	140	4,63%	-0,80%	-8,70%
'76	Aluminium	158	11,71%	63	2,11%	116	3,83%	-20,60%	16,70%
'84	Machinery, nuclear reactors, boilers	27	2,00%	65	2,18%	96	3,17%	24,70%	10,00%
'47	Pulp of wood, fibrous cellulosic material	59	4,37%	54	1,81%	78	2,58%	-2,30%	9,60%
'29	Organic chemicals	29	2,15%	62	2,08%	75	2,48%	21,20%	4,90%
'71	Pearls, precious stones, metals, coins	71	5,26%	70	2,35%	64	2,12%	-0,20%	-2,50%
'51	Wool, animal hair	18	1,33%	33	1,11%	26	0,86%	16,10%	-5,80%
'32	Tanning, dyeing extracts	9	0,67%	13	0,44%	16	0,53%	9,30%	4,90%
	Top Exports Total	1219	90%	2851,7	96%	2885	95%		

Table 3.12
Revealed Comparative Advantage Indices for SA exports to India, 2002-2013

Product code	Product label	RCA			% Change (CAGR)	
		2002	2008	2013	2002-2008	2008-2013
'51	Wool, animal hair, horsehair yarn and fabric thereof	5.43	10.36	10.86	10%	1%
'47	Pulp of wood, fibrous cellulosic material, waste etc	23.56	9.11	9.89	-13%	1%
'28	Inorganic chemicals	35.32	37.68	6.91	1%	-25%
'26	Ores, slag and ash	1.44	9.04	6.85	30%	-5%
'72	Iron and steel	3.49	3.49	5.54	0%	8%
'76	Aluminium and articles thereof	7.01	5.72	4.16	-3%	-5%
'27	Mineral fuels, oils, distillation products, etc	2.60	1.62	3.10	-7%	11%
'79	Zinc and articles thereof	5.57	1.08	1.80	-21%	9%
'70	Glass and glassware	0.05	0.05	1.25	0%	70%
'32	Tanning, dyeing extracts, dyes, pigments etc	0.39	0.80	1.18	11%	7%
'25	Salt, sulphur, earth, stone, plaster, lime and cement	0.31	0.88	1.10	16%	4%
'78	Lead and articles thereof	0.00	0.38	1.07	undef	19%
'29	Organic chemicals	1.99	0.66	0.99	-15%	7%

Identification of trade opportunities in manufactured products

As already indicated, South Africa's trade with India is characterised by export of primary commodities. As such, the manufactured products that the country needs to prioritise to increase the pace of transformation are very limited. The country witnessed falling export opportunities with respect to pulp of paper and tanning products (table 3.13). Nonetheless, given the rapid economic growth projection for India, South Africa could experience more than average growth in India's demand for these products in the near future. Meanwhile, it is important to note that there was contraction in India's demand for inorganic chemicals, salt, sulphur etc., and glass and glassware in 2013. As a result, these products were not considered in the analysis; despite

that South Africa has comparative advantages in them.

Main products imported by SA from India

South Africa's imports from India have been steadily increasing over time largely driven by mineral fuels (bituminous substances and mineral waxes); vehicles, pharmaceuticals, machinery and cereals. South Africa's imports from India grew by 12.4 per cent and 17.3 per cent annually between 2007 and 2010 and 2010 to 2013 respectively. Cereals (mostly rice) have grown significantly between 2010 and 2013 achieving compound annual growth of 79.5 per cent. Cereals are followed by organic chemicals, vehicles, mineral fuels and pharmaceuticals in terms of annual growth between 2010 and 2013 (table 3.14).

Table 3.13
Export Opportunities for SA Manufactured Products to India (%)

Sector	Growth in India's demand		SA's market share		RCA	Export opportunities
	2011-2013	2013	2011	2013	2013	
Pulp of paper	7.6	6.6	5.7	5.8	Decreasing	Falling opportunities
Tanning, dyeing extracts, tannins, derivs, pigments et	10.0	4.6	0.8	1.1	Increasing	Falling opportunities

Table 3.14
South Africa's top imports from India, 2007-2013 (US\$ million)

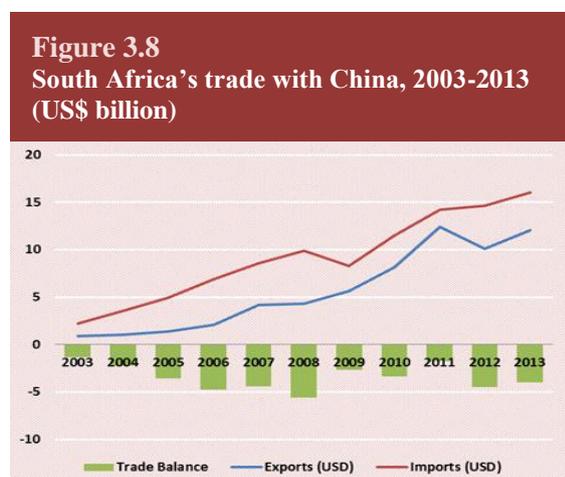
Product code	Product label	2007		2010		2013		2007-10	2010-13
		Value	Share	Value	Share	Value	Share	CAGR	CAGR
TOTAL	All products	1 778		2 839		5 377		12,40%	17,30%
'27	Mineral fuels, oils, distillation products	453	25,5%	843	29,7%	1806	33,6%	16,8%	21,0%
'87	Vehicles other than railway, tramway	201	11,3%	383	13,5%	958	17,8%	17,4%	25,8%
'30	Pharmaceutical products	83	4,7%	222	7,8%	422	7,8%	27,7%	17,4%
'85	Electrical, electronic equipment	78	4,4%	247	8,7%	398	7,4%	33,3%	12,7%
'84	Machinery, nuclear reactors, boilers	97	5,5%	119	4,2%	215	4,0%	5,1%	16,0%
'10	Cereals	94	5,3%	21	0,7%	215	4,0%	-31,5%	79,5%
'29	Organic chemicals	69	3,9%	82	2,9%	212	3,9%	4,6%	26,7%
'72	Iron and steel	79	4,4%	64	2,3%	113	2,1%	-5,3%	15,4%
'73	Articles of iron or steel	28	1,6%	71	2,5%	86	1,6%	26,4%	5,0%
'71	Pearls, precious stones, metals, coins	35	2,0%	53	1,9%	72	1,3%	11,2%	7,7%
'39	Plastics	27	1,5%	67	2,4%	71	1,3%	25,3%	1,3%
'99	Commodities not elsewhere specified	47	2,6%	27	1,0%	66	1,2%	-13,3%	25,8%
'40	Rubber and articles thereof	33	1,9%	32	1,1%	45	0,8%	-1,2%	9,3%
	Total Top Imports	1324	74,5%	2231	78,6%	4679	87,0%		

South Africa's trade with China

Trade trends

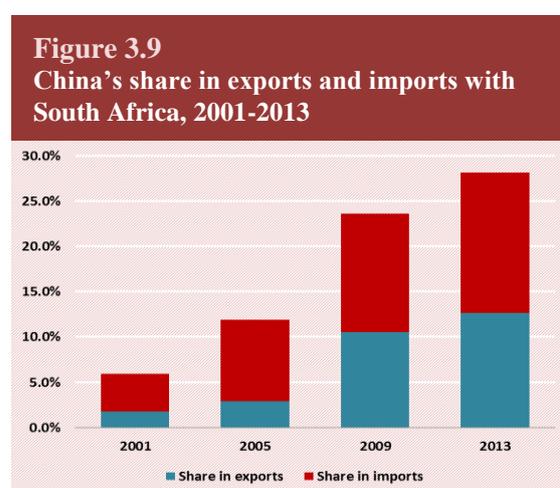
China is set to make the largest impact on South Africa's trade, as the partnership between the two countries continues to evolve over time. Bilateral trade has been gradually expanding since diplomatic relations were established in 1998. In 2010, China signed a strategic partnership agreement (focussing on 38 cooperation agreements) in the area of trade, investment, mineral exploitation and agriculture. South Africa's merchandise export has been gradually increasing from US\$ 889 million in 2003 to US\$ 5.67 billion in 2009. The inclusion of the South Africa into BRIC coincided or led to a substantial increase in exports from US\$ 8.1 billion in 2010 to US\$ 12.1 billion in 2013 (figure 3.8). As opposed to other countries (Brazil, India and Russia), exports to China increased even during the global recession but declined in 2012 before recovering in 2013. This trend is a clear indication of the resilience of the Chinese economy during the global downturn.

Imports from China have been on the increase year on year from 2003 with the exception of 2008 and 2009. The compound annual growth for imports between 2003 and 2013 was 20 per cent. The increase in imports over exports reflected in the country's trade balance, which has consistently been negative between 2003 and 2013 (figure 3.8). The largest trade deficit of US\$ 5.6 billion was witnessed in 2008 and this improved to US\$ 1.8 billion in 2011 before escalating to close to US\$ 4 billion in 2013.



China's market share

The proportion of the value of the exports to China and their relative share of South African global exports increased from 1.77 per cent in 2001 to 12.7 per cent in 2013. On the other hand, the share of South Africa's imports from China relative to South Africa's global imports has been increasing from 4.2 per cent in 2001 to 15.5 per cent in 2013. Amongst the BRICS countries, China is the single most important trading partner with South Africa accounting for more than a quarter (28 per cent) of South Africa's trade in 2013 compared to 6 per cent in 2001 (see figure 3.9).



Main products exported to China by SA

After a significant growth of 18 per cent between 2007 and 2010, South Africa's exports to China declined thereafter to 10 per cent in 2010-2013 (see table 3.15). South Africa's exports to China are predominately natural resource-based products such as ores (accounting for 66.5 per cent of total exports in 2013), iron and steel (9 per cent), mineral fuels (8.3 per cent) and pearls (2.7 per cent). An analysis for the past decade reveals insignificant changes to the top 10 exported products to China.

More than three-quarter of exports to China (75.6 per cent to be precise) in 2013 was in ores and iron and steel. China accounted for almost 59 per cent (17 per cent) of the country's total exports of ores (iron and steel) in 2013 compared to 31 per cent (12 per cent) in 2007.

Although its market remained relatively small, notice the impressive export growth in vehicles, machinery and pulp of wood between 2007 and 2013. Ores, pearls and copper managed to sustain its growth trajectory between 2007 and 2013. Negative and zero export growth are witnessed for nickel and plastic products. The general trend of SA exports to China reflected its comparative advantage in the production of primary commodities

Revealed Comparative Advantage (RCA)

Unsurprisingly, table 3.16 shows that South Africa has comparative advantage in largely resource based sectors such as ores, nickel and iron and steel amongst others.

It is worth noting that South Africa is gradually losing its comparative advantage between 2002 and 2013. Just as a comparison, South Africa had comparative advantage in 19 product sectors in 2002 and this declined to 13 in 2008 and further deteriorated to 8 in 2013. This is indeed a worrying development. Some of the product sectors that South Africa lost its comparative advantage include: aluminium, salt (including sulphur, earth, and cement), fish, tanning products, inorganic products, organic chemicals, tobacco and other base metals.

Despite this development, South Africa has managed to improve its comparative advantage in wool/animal hair (from 12.54 in 2002 to 22.82 in 2013) and raw hides and skins (from 1.77 to 3.77) between 2002 and

2013. South Africa has also managed to migrate from a position of comparative disadvantage to comparative advantage in lead products between 2002 and 2013.

Identification of trade opportunities in Manufactured Products

In terms of manufactured products, South Africa has virtually no manufactured product that it has comparative advantage as shown in Table 3.16 below. This implies that there are no export opportunities for manufactured products to China given the loss in comparative advantage over the years.

Main products imported from China

Amongst the top 10 imported products from China, eight are manufactured products and only two are semi-processed primary products (table 3.17). More interestingly, the most significant imports are in industries that South Africa's Industrial Policy Action Plan aims to promote exports (such as machinery, footwear, textile, furniture plastics and chemicals).

South Africa's imports from China grew by an average of 8.6 per cent per annum between 2010 and 2013 from US\$ 11.5 billion to US\$ 16 billion. Electrical equipment is still the most important imported product – it grew by 8.6 per cent annually between 2010 and 2013. Iron and steel imports experienced considerable annual growth of 30.8 per cent between 2010 and 2013, followed by plastics at 12 per cent and Machinery at 10 per cent.

Table 3.15
South Africa's top exports to China, 2007-2013 (US\$ million)

Product code	Product label	2007		2010		2013		2007-10	2010-13
		Value	Share	Value	Share	Value	Share	CAGR	CAGR
TOTAL	All products	4 169		8 132		11 999		18%	10%
'26	Ores, slag and ash	1380	33,1%	5 262	64,7%	7 982	66,5%	40%	11%
'72	Iron and steel	869	20,8%	930	11,4%	1079	9,0%	2%	4%
'27	Mineral fuels, oils, distillation products	1233	29,6%	517	6,4%	992	8,3%	-20%	18%
'71	Pearls, precious stones, metals, coins	27,9	0,7%	249	3,1%	328	2,7%	73%	7%
'74	Copper and articles thereof	105,8	2,5%	184	2,3%	239	2,0%	15%	7%
'51	Wool, animal hair, horsehair yarn and fabric	67,8	1,6%	88	1,1%	214	1,8%	7%	25%
'47	Pulp of wood, fibrous cellulosic material, waste	32,7	0,8%	95,4	1,2%	210	1,8%	31%	22%
'84	Machinery, nuclear reactors, boilers	61,4	1,5%	72,1	0,9%	163	1,4%	4%	23%
'87	Vehicles other than railway, tramway	11,3	0,3%	11,5	0,1%	144	1,2%	0%	88%
'75	Nickel and articles thereof	0,33	0,0%	0,152	0,0%	100	0,8%	47%	-10%
'39	Plastics and articles thereof	0,42	0,0%	0,86	0,0%	0,86	0,0%	19%	0%
	Total Top Exports	3 790	90,9%	7 410	91,1%	11 451	95,4%		

Table 3.16
Revealed Comparative Advantage Indices for SA exports to China, 2002-2013

Product code	Product label	RCA			% Change (CAGR)	
		2002	2008	2013	2002-08	2008-13
'26	Ores, slag and ash	107.15	63.76	48.01	-7%	-5%
'51	Wool, animal hair, horsehair yarn and fabric thereof	12.54	21.83	22.82	8%	1%
'47	Pulp of wood, fibrous cellulosic material, waste	12.03	6.43	6.77	-9%	1%
'75	Nickel and articles thereof	5.46	7.92	5.32	5%	-6%
'72	Iron and steel	10.06	4.32	4.12	-11%	-1%
'41	Raw hides and skins & leather	1.77	2.83	3.77	7%	5%
'74	Copper and articles thereof	10.78	3.00	2.19	-17%	-5%
'78	Lead and articles thereof	0.00	0.00	1.74	undef	undef
'71	Pearls, precious stones, metals, coins	0.06	2.64	0.82	72%	-18%
'76	Aluminium and articles thereof	2.41	1.49	0.71	-7%	-12%
'08	Edible fruit, nuts, peel of citrus fruit, melons	0.36	0.10	0.60	-17%	35%
'27	Mineral fuels, oils, distillation products, etc	0.15	0.15	0.48	0%	22%
'25	Salt, sulphur, earth, stone, plaster, lime and cement	5.49	1.19	0.42	-20%	-16%
'22	Beverages, spirits and vinegar	0.05	0.22	0.30	25%	5%
'38	Miscellaneous chemical products	0.39	0.35	0.28	-2%	-3%
'68	Stone, plaster, cement, asbestos, mica, etc articles	3.35	0.25	0.27	-31%	1%
'03	Fish, crustaceans, molluscs, aquatic invertebrates	2.23	0.22	0.27	-28%	4%
'32	Tanning, dyeing extracts, pigments	1.92	0.52	0.26	-17%	-11%
'28	Inorganic chemicals, precious metal compound	2.01	0.85	0.25	-12%	-18%
'39	Plastics and articles thereof	0.08	0.63	0.22	34%	-16%
'29	Organic chemicals	1.70	0.75	0.19	-11%	-21%
'44	Wood and articles of wood, wood charcoal	0.59	0.01	0.17	-42%	54%
'20	Vegetable, fruit, nut, etc food preparations	0.22	0.14	0.16	-7%	3%
'87	Vehicles other than railway, tramway	0.01	0.01	0.16	0%	49%
'67	Bird skin, feathers, artificial flowers, human hair	0.02	0.03	0.14	8%	28%
'84	Machinery, nuclear reactors, boilers, etc	0.15	0.07	0.12	-9%	9%
'05	Products of animal origin, nes	3.66	2.50	0.11	-5%	-40%
'86	Machinery, nuclear reactors, boilers, etc equipment	6.89	0.25	0.11	-38%	-13%
'01	Live animals	0.21	0.24	0.08	2%	-16%
'81	Other base metals, cermets, articles thereof	2.18	0.03	0.06	-46%	13%

Table 3.17
South Africa's top imported products from China, 2007-2013 (US\$ million)

Product code	Product label	2007		2010		2013		2007-10	2010-13
		Value	Share	Value	Share	Value	Share	CAGR	CAGR
TOTAL	All products	8 563		11 499		16 010		7,6%	8,60%
'85	Electrical, electronic equipment	1735	20,3%	2 594	22,6%	3 816	23,8%	10,6%	10,1%
'84	Machinery, nuclear reactors, boilers	1980	23,1%	2 456	21,4%	3 595	22,5%	5,5%	10,0%
'64	Footwear, gaiters	469	5,5%	547	4,8%	676	4,2%	3,9%	5,5%
'61	Articles of apparel, accessories, knit	270	3,2%	432	3,8%	508	3,2%	12,4%	4,1%
'62	Articles of apparel, accessories, not knit	284	3,3%	488	4,2%	497	3,1%	14,5%	0,5%
'73	Articles of iron or steel	252	2,9%	325	2,8%	460	2,9%	6,5%	9,0%
'39	Plastics	190	2,2%	290	2,5%	457	2,9%	11,1%	12,0%
'94	Furniture, lighting, signs, prefabricated buildings	278	3,2%	343	3,0%	447	2,8%	5,4%	6,8%
'87	Vehicles other than railway, tramway	432	5,0%	351	3,1%	415	2,6%	-5,1%	4,3%
'72	Iron and steel	94	1,1%	120	1,0%	352	2,2%	6,4%	30,8%
'29	Organic chemicals	159	1,9%	273	2,4%	337	2,1%	14,4%	5,4%
	Total Top Imports	6 143	71,7%	8 219	71,5%	11 560	72,2%		

Table 3.18**Equivalent ad valorem tariff applied by BRICs to South Africa's top exports, 2013**

Product Code	Sector	BRAZIL	RUSSIA	INDIA	CHINA
		Equivalent ad valorem tariff applied by Brazil	Equivalent ad valorem tariff applied by Russia	Equivalent ad valorem tariff applied by India	Equivalent ad valorem tariff applied by China
'08	Edible fruit, nuts, citrus fruit, melons	9.9	4.9	31.6	4.1
'20	Vegetable, fruit, nut	16.4	10.6	30	19.6
'22	Beverages, spirits and vinegar	21	43.8	121.1	10.1
'25	Salt, sulphur, plaster, lime & cement	2.4	4	5.5	0
'26	Ores, slag and ash	2.2	1.7	2.1	0
'27	Mineral fuels, oils	0.3	2.8	1.8	0.9
'28	Inorganic chemicals, precious metal	6.7	4.8	6.8	1.3
'29	Organic chemicals	6.5	4.7	6.8	0.9
'32	Tanning, dyeing extracts, pigments	12.5	2.9	9.2	3.3
'38	Miscellaneous chemical products	10.6	5.2	8.1	1.7
'39	Plastics and articles thereof	12.6	9.8	8.1	4.8
'40	Rubber and articles thereof	13.3	8.6	11.7	16
'47	Pulp of wood	3.5	8	6.2	0
'51	Wool, animal hair & fabric	16	8.5	15.4	5.7
'71	Pearls, precious stones, metals, coins	8.7	17.5	10	1.2
'72	Iron and steel	11.3	3.8	5	0
'74	Copper and articles thereof	8.7	3.1	5.4	1.4
'75	Nickel and articles thereof	9	4.5	2	0
'76	Aluminium and articles thereof	9.5	7.2	5.8	4.9
'84	Machinery, nuclear reactors, boilers	11.8	2.2	5.9	1.9
'85	Electrical, electronic equipment	11	6.5	5	4.2
'87	Vehicles other than railway, tramway	27.1	11.2	60.2	17

Potential Risks with BRICS

Whilst the GDP outlook for BRICS looks positive as discussed above, there are significant risks that South Africa should be aware of from a trade perspective. Tariff levels remain a concern though the BRICS countries are part of the WTO. A closer look at the tariff levels for South's major exports reveals that tariffs have been considerably higher for manufactured products as compared to resource based products (see table 3.18). This will therefore limit the pace of structural change – the move from traditional resource based exports to manufactures. Interestingly, China does not levy tariffs on most of the resource based imports from South Africa such as ores, pulp of wood, iron and steel.

Conclusion

Summarising the above trends, it is clear that the level of transformation from resource based exports to manufactured exports has been slow. The manufactured products that South Africa needs to prioritise to increase the pace of transformation are very limited.

Trade relations between South Africa and the rest of BRIC's should be put into perspective. South Africa's trade with most of these countries is characterised by export of raw

materials and imports of manufactured goods. In particular China (and to a lesser extent India) is becoming an important trading partner with South Africa. However, China's exports to South Africa and the rest of the continent compete with the domestic manufacturing sector. On the other hand, trade with Brazil falls short of the deemed potential and is quite negligible, yet the composition of exports to the country is mainly in more value-added manufactured goods.

South Africa's significant natural resources are being extracted and exported in their raw form and not as processed or finished products. This is a serious missed opportunity for more robust, diversified and sustainable development. This suggests that minerals beneficiation is important element for structural transformation and the industrialisation of South Africa. It will ensure that more value is added to domestic mineral products before exporting them.

Having said that, to accelerate the pace of manufacturing structural transformation, the country needs to boost exports in those products that are in demand in which it has gained more comparative advantage. Such product includes miscellaneous chemicals (with respect to Brazil); salt, sulphur, etc.(Russia) and Tanning, dyeing, etc. (India).

In addition, South Africa can also raise its competitiveness (by re-looking at cost structure, R&D and innovation), particularly in those manufactured products which are in demand but in which it is losing or has lost comparative advantage, such as impregnated or coated textile fabric (with respect to Brazil); optical, photos, medical apparatus, residues etc., and photographic or cinematographic goods (Russia); pulp of paper, paper and paperboard and explosives (India) and tobacco, tanning and fish, crustaceans etc. (China).

Meanwhile, the modest economic growth projections for Brazil and Russia narrows export opportunities for products whose demand are less than average (otherwise called falling opportunities).

Chapter 4

Attractiveness of EU, US and Japan markets

The collapse of Lehman Brothers in September 2008 triggered a synchronised recession in advanced economies, a sharp decline in global trade and manufacturing and a sovereign debt crisis in highly indebted Eurozone countries. Recovery remains sluggish and risks for the near future are still high. This has a negative impact on South Africa. Hence, the extent to which South Africa mitigates the effect of the slow recovery on the economy depends on how well it positions itself against future risks.

This chapter analyses South Africa's trade with its traditional partners, the EU, US and Japan, in order to identify what shape future demand from these regions will take, and where the greatest benefits can be reaped. Data on these countries are taken from COMTRADE unless otherwise stated.

EU, US and Japan's economic outlook

Together the EU and U.S. generate 37 per cent of the world's economic output of US\$87.2 trillion at purchasing power parity in 2013, down from 43 per cent in 2007. This decline in world's share of GDP is expected to continue over the period ahead.

Table 4.1
GDP growth outlook 2013-2017

	2013	2014	2015	2016	2017
World	2.87	3.59	3.96	4.07	4.11
Japan	1.95	1.24	1.14	1.17	1.13
USA	1.56	2.59	3.35	3.48	3.36
EU	0.02	1.25	1.6	1.76	1.83
Germany	0.49	1.4	1.39	1.32	1.27
UK	1.43	1.87	1.98	1.98	2.06
Netherlands	-1.27	0.31	1.63	1.84	2.04

Source: World Economic Outlook (IMF), October 2014

According to the IMF 2014 projections, The European Union as a block is projected to grow by less than 1.9 per cent between 2015

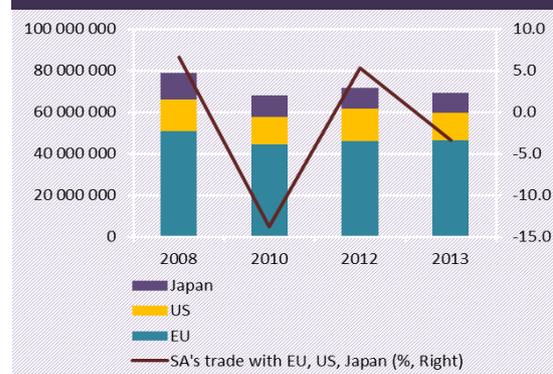
and 2017. Japan over the same period will grow by around 1 per cent. Only the United States of America is expected to experience a relatively higher annual growth rate of at least 3 per cent over the same period (see table 4.1).

Despite the relatively high growth projections for BRIC economies (as witnessed in the preceding chapter), there is still a need to maintain trade with these traditional partners (EU, US and Japan). South Africa could still take advantage of the relatively large size of these markets to develop sectors that have potential in transforming the economy.

Intra-trade between South Africa and EU, US and Japan

While total external trade (exports plus imports) of these economies increased moderately to about US\$ 17 trillion in 2013 from US\$ 15 trillion in 2007, their share in world total trade declined from 55 per cent to 47 per cent over the same period. Nonetheless, total demand by these countries (or imports) accounted for 48 per cent of world's total in 2013, still affording a substantial market for goods.

Figure 4.1
Overall SA's trade with EU, US and Japan (US\$ thousand)



South Africa's trade with these countries has grown weaker, decreasing by 3 per cent in 2013 after a 5 per cent recovery in 2012 (figure 4.1). However, these economies remain the main destination for more than 30 per cent of the country's total exports to the world (more than half of which goes to the EU).

Germany, United Kingdom and Netherlands are the main importers of South Africa's goods in the EU; with Germany (the largest country in the EU and the 15th largest country in the world in terms of population) trading more with South Africa than do other economies (table 4.2).

Table 4.2
Intra-trade between SA, EU, US and Japan (US\$ billion)

		Source					
		South Africa	Japan	USA	UK	Germany	Netherlands
Destination	South Africa	-	9.65	13.46	6.64	14.53	4.74
	Japan	10.21	-	206.5	17.68	42.79	18.42
	USA	15.9	207.29	-	100.9	163.86	56.78
	UK	8.79	18.0	117.3	-	136.89	91.13
	Germany	17.04	50.41	184.2	146.1	-	197.28
	Netherlands	4.48	15.36	56.78	84.69	225.26	-

We now turn to evaluate South Africa's trade with each of the traditional partners in order to identify respective priority sectors that could be targeted.

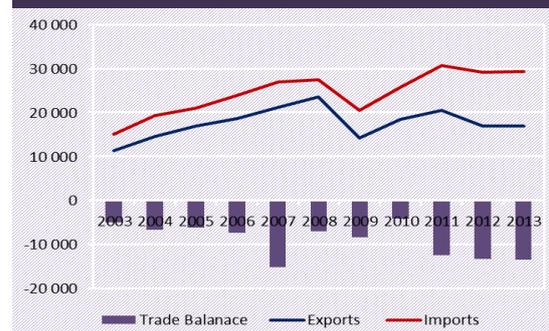
South Africa-EU trade

Trade trends

Since the end of South Africa's apartheid, EU South African relations have flourished and they began a "Strategic Partnership" in 2007. In 1999 the two sides signed a Trade, Development and Cooperation Agreement (TDCA) which became effective in 2004, with some provisions being applied from 2000. The TDCA covered a wide range of issues from political cooperation, development and the establishment of a free trade area (FTA). The liberalisation schedules were completed by 2012. The TDCA is now revised as part of Economic Partnership Agreement (EPA), which gave the country marked benefits over the existing bilateral Trade.

Following slow economic recovery since 2010, South African exports to the EU had fallen from US\$23.6 billion in 2008 to US\$16.9 billion in 2013 (after increasing by US\$12 billion between 2003 and 2008), while imports from the EU had risen from US\$27.4 billion to US\$29.4 billion over this period. This resulted in South Africa having a negative trade balance.

Figure 4.2
SA's trade with EU, 2003-2013 (US\$ million)



EU's market share

The proportion of the value of the exports to the EU and their relative share of South African total exports decreased dramatically from 37 per cent in 2001 to 18 per cent in 2013. On the other hand the share of country's imports from the EU has also declined, albeit at a slow pace than exports, from 41 per cent to 28 per cent over the same period.

Figure 4.3
EU's share in SA trade, 2001-2013



Main products exported to EU by SA

South Africa's exports to the EU declined on average by 3.3 per cent per annum (compound annual growth) between 2007 and 2010 from

US\$ 21.2 billion to US\$ 18.5 billion. However, exports declined further on average by 4.5 per cent between 2010 and 2013 (see table 4.3). Within the top 10 export products to the EU, 5 (1) are primary commodities (agricultural products) namely pearls, precious stones etc., ores, iron and steel, mineral fuels and aluminium (edible fruit, nuts etc.). The remainder of the exports are manufactured products. The top 10 products accounted for 78 per cent of all exports to the EU in 2007 and this increased to 81 per cent in 2010 as well as in 2013.

Major export products to the EU in 2013 were in pearls (mainly platinum and diamonds) accounting for (15 per cent), ores (12 per cent), machinery (12 per cent) and vehicles (11 per cent).

Although the market remained relatively small, edible fruits (mainly citrus fruit, grapes and apples) to Netherlands and U.K. were the fastest growing products between 2010 and 2013, achieving compound annual growth of 8.1 per cent from US\$ 1.1 billion to US\$ 1.3 billion. This is followed by ores at 4 per cent to Netherlands and Finland. Moreover, the country could see an improvement in the exports of beverages (mainly wine) to Germany, France and Italy, which is currently at 0.9 per cent, following the new trade pact under EPA, which comes with a significant access to the EU market for wine (110 million litres duty free). However, negative export growth is witnessed for pearls, machinery, iron and steel, minerals and aluminium. This suggests that the decline in South Africa's total exports to the EU in 2013 was driven by slowing demand in primary commodities.

Revealed Comparative Advantage (RCA) with the EU

South Africa has gained comparative advantage in all the top manufactured exports in 2013 (see table 4.4). This suggests that there is a greater alignment of industrial policy and trade policy with respect to South Africa's trade with the EU. Moreover, it is worth noting that while South Africa in 2008 had comparative disadvantage in other base metals and nickel, it managed to turn its fortunes in 2013, although these products do not feature in the top 10 export products for 2013. The

country has also gained comparative advantage in beverages which is the top eighth exports to the EU.

South Africa is losing ground (though they still have comparative advantage) in furniture, ores, pearls, pulp of wood and fish, crustaceans etc., where its comparative advantage is sliding. More worrying are product categories where South Africa lost its comparative advantage between 2002 and 2013 – these products include paper and paperboard, tools, rubber, umbrellas, stones or plaster or cement, and minerals.

Identification of trade opportunities in manufactured products

Again we follow the same framework discussed in Chapter 3 to detect manufactured products that South Africa can take advantage of. The results are presented in table 4.5.

Evidence shows that South Africa lost export opportunities to the EU in vehicles, furniture and pulp of paper. The country did not manage to capture a portion of the increasing EU's demand in these products in 2013. Yet there was an opportunity to expand exports further.

However, while the market share for beverages (mainly wine) and organic chemicals have increased, the demand for the products by the EU has declined, but given the new EPA agreement, South Africa could witness more than average growth in the EU's demand for these products in the near future, provided it can raise competitiveness in beverages. Moreover, the country witnessed limited export opportunities with respect to railway, locomotives, rolling stock and tools.

Main products imported from the EU

Amongst the top 10 imported products from the EU, only two are primary products namely minerals and articles of iron and steel. The remainder of the imports are manufactured products (see table 4.6). South Africa's imports from the EU grew on average by 3.3 per cent annually between 2010 and 2013 from USD25.8 billion to USD29.4 billion. Machinery and vehicles were the most important imported products from the EU – they grew annually by 4.5 per cent and 8.1 per

cent between 2010 and 2013, respectively. South Africa imported just over 40 per cent of its machinery and vehicles from the EU.

Pharmaceuticals product was the fifth largest imported product from the EU but there was a decline (0.7 per cent annually) between 2010 and 2013. The top 10 imported products accounted for 74 per cent of all imports in 2007 and this remain unchanged in 2013.

Table 4.3
South Africa's top exports to the EU (US\$ million)

Product code	Product	2007		2010		2013		Change (%)	
		Value	Share	Value	Share	Value	Share	2007-2010	2010-2013
	All products	21 151		18 487		16 880		-3.3	-4.5
'71	Pearls, precious stones, metals, coins, etc	3 734	17.7	2 940	15.9	2 574	15.2	-5.8	-6.5
'26	Ores, slag and ash	1 567	7.4	1 934	10.5	2 094	12.4	5.4	4.0
'84	Machinery, nuclear reactors, boilers, etc	3 202	15.1	2 208	11.9	2 011	11.9	-8.9	-4.6
'87	Vehicles other than railway, tramway	1 265	6.0	2 086	11.3	1 895	11.2	13.3	-4.7
'72	Iron and steel	2 240	10.6	2 187	11.8	1 347	8.0	-0.6	-22.7
'27	Mineral fuels, oils, distillation products, etc	2 279	10.8	1 351	7.3	1 334	7.9	-12.3	-0.6
'08	Edible fruit, nuts, peel of citrus fruit, melons	907	4.3	1 079	5.8	1 265	7.5	4.4	8.1
'22	Beverages, spirits and vinegar	532	2.5	586	3.2	596	3.5	2.5	0.9
'29	Organic chemicals	258	1.2	321	1.7	306	1.8	5.6	-2.2
'76	Aluminium and articles thereof	561	2.7	232	1.3	248	1.5	-19.8	3.3

Table 4.4
Revealed Comparative Advantage indices for SA exports to the EU, 2002-2013

HS Chapter	Sector	RCA			Change (%)	
		2002	2008	2013	2002-2008	2008-2013
'08	Edible fruit, nuts, peel of citrus fruit, melons	8.12	9.13	14.06	2%	7%
'94	Furniture, lighting, signs, prefabricated buildings	51.34	27.70	11.17	-8%	-14%
'51	Wool, animal hair, horsehair yarn and fabric thereof	7.41	5.82	9.71	-3%	9%
'26	Ores, slag and ash	12.10	10.03	9.06	-3%	-2%
'75	Nickel and articles thereof	0.53	0.40	5.81	-4%	56%
'22	Beverages, spirits and vinegar	4.29	4.31	5.74	0%	5%
'41	Raw hides and skins (other than furskins) and leather	3.13	1.93	4.62	-7%	16%
'71	Pearls, precious stones, metals, coins, etc	6.31	6.35	4.47	0%	-6%
'81	Other base metals, cermets, articles thereof	0.93	0.38	4.17	-12%	49%
'72	Iron and steel	3.66	3.85	3.66	1%	-1%
'86	Railway, tramway locomotives, rolling stock, equipment	2.78	2.71	3.00	0%	2%
'20	Vegetable, fruit, nut, etc food preparations	2.66	1.87	2.67	-5%	6%
'25	Salt, sulphur, earth, stone, plaster, lime and cement	2.59	2.26	2.41	-2%	1%
'47	Pulp of wood, fibrous cellulosic material, waste etc	4.75	2.14	2.15	-11%	0%
'03	Fish, crustaceans, molluscs, aquatic invertebrates	2.82	2.92	1.93	1%	-7%

Table 4.5
Export opportunities for SA manufactured products to the EU (%)

Sector	Growth in EU's demand		SA's market share		RCA 2013	Export opportunities
	2011-2013	2013	2011	2013		
Vehicles	4.3	7.9	0.44	0.40	Increasing	Lost opportunities
Beverages	5.6	5.4	1.22	1.33	Decreasing	Falling opportunities
Organic chemicals	6.1	0.7	0.16	0.17	Increasing	Falling opportunities
Furniture	1.9	3.8	0.41	0.24	Decreasing	Lost opportunities
Railway, locomotives and rolling stock	4.6	2.4	1.09	1.01	Decreasing	Limited opportunities
Pulp of paper	-1.0	4.3	0.63	0.55	Increasing	Lost opportunities
Tools, implements, cutlery, etc of base metal	5.3	3.5	0.16	0.12	Increasing	Limited opportunities

Table 4.6
South Africa's top imports from the EU (US\$ million)

Product code	Product	2007		2010		2013		Change (%)	
		Value	Share	Value	Share	Value	Share	2007-2010	2010-2013
	All products	26 987		25 831		29 383		-1.1	3.3
'71	Machinery, nuclear reactors, boilers, etc	6 097	22.6	5 119	19.8	6 095	20.7	-4.3	4.5
'26	Vehicles other than railway, tramway	3 893	14.4	3 149	12.2	4 306	14.7	-5.2	8.1
'84	Commodities not elsewhere specified	2 544	9.4	2 955	11.4	2 965	10.1	3.8	0.1
'87	Electrical, electronic equipment	3 202	11.9	2 575	10.0	2 822	9.6	-5.3	2.3
'72	Pharmaceutical products	941	3.5	1 299	5.0	1 263	4.3	8.4	-0.7
'27	Optical, photo, technical, medical, etc apparatus	929	3.4	879	3.4	1 033	3.5	-1.4	4.1
'08	Mineral fuels, oils, distillation products, etc	685	2.5	1 249	4.8	997	3.4	16.2	-5.5
'22	Plastics and articles thereof	795	2.9	807	3.1	965	3.3	0.4	4.6
'29	Miscellaneous chemical products	521	1.9	637	2.5	735	2.5	5.1	3.7
'76	Articles of iron or steel	450	1.7	378	1.5	608	2.1	-4.3	12.6

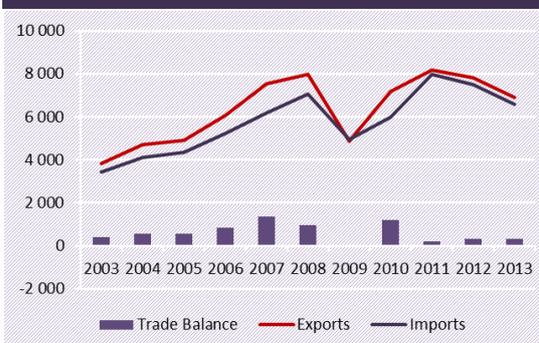
South Africa-USA trade

Trade trends

South Africa's preferential trade with the US is mainly governed by the Generalized System of Preferences (GSP) and the African Growth and Opportunity Act (AGOA). The Generalised System of Preferences and AGOA provide eligible countries with reduced duty rates or duty-free access into the United States for qualifying exports from eligible SSA countries and was enacted in 2000 to boost and diversify trade with the US. Duty free access to the US market under the combined AGOA/GSP programmes stands at approximately 70 000 product tariff lines. These include items such as wine, selected motor vehicle components, some agricultural products, steel, clothing and footwear amongst others. Almost 95 per cent of South African exports receive preferential treatment under AGOA and this trade legislation's term comes to an end in 2015.

Trade between these two countries has generally been on an upward trend since the implementation of the AGOA legislation in 2000. South Africa's merchandise exports to US have more than doubled from US\$ 3.8 billion in 2003 to US\$ 7.8 billion in 2012 before reducing to US\$ 6.8 billion in 2013 (figure 4.4). Imports on the other hand have been gradually increasing, albeit at a slower pace compared to exports, culminated in the country's trade balance which has been consistently positive since 2003 (except for 2009).

Figure 4.4
SA's trade with US, 2003-2013 (US\$ million)



US's market share

The proportion of the value of the exports to the US and their relative share of South African total exports decreased from 14 per cent in 2001 to 7.2 per cent in 2013. At the same time, the share of country's imports from the US also declined from 11 per cent to 6.3 per cent. Nonetheless, the country exports more to US than it imports.

Figure 4.5
US's share in SA trade, 2001-2013



Main products exported to US by SA

South Africa's exports to the US declined on average by 1.2 per cent per annum (compound annual growth) between 2007 and 2010 from US\$ 7.5 billion to US\$ 7.2 billion. However, exports declined further on average by 1.0 per cent between 2010 and 2013 (see table 4.7). Within the top 10 export products to the US, 5 are primary commodities namely pearls, precious stones etc., iron and steel, ores, aluminium and mineral fuels. The remainder of the exports are manufactured products. The top 10 products accounted for 89 per cent of all exports to the US in 2007 and this decreased to 88 per cent in 2010 and 87 per cent in 2013.

Vehicles were the leading export products to US in 2013. Between 2007 and 2013, the share of vehicles exported to the US increased dramatically from 9 per cent or US\$ 681 million to 24.7 per cent or US\$ 1.7 billion. US accounted for almost 21 per cent of the country's total exports of vehicles in 2013 compared to 13 per cent in 2007. However, the market for pearls (predominantly platinum), although still among the top 4 exports to US, shrank in 2013 compared to 2007.

Although the market remained relatively small, aircraft, spacecraft and parts were the fastest growing products between 2010 and 2013, achieving compound annual growth of 45 per cent from US\$ 36 million to US\$ 106 million. This is followed by minerals and ores at 19 per cent and 17 per cent respectively. However, negative export growth is witnessed for inorganic chemicals, pearls, vehicles and iron and steel. This suggests that the decline in South Africa's total exports to the US in 2013 could be due to slowing demand in these products.

Revealed Comparative Advantage (RCA) with the US

The country has comparative advantage in most of the products that top the export list, except for other base metals, explosives, railway, locomotives and edible fruits (table 4.8). It is important to note that while South Africa in 2008 had comparative disadvantage in machine tools, it managed to turn its fortunes in 2013, although these products do

not feature in the top 10 export products for 2013. The country has also gained comparative advantage in most of the products exported to US.

However, the country is losing ground (though they still have comparative advantage) in pearls, inorganic chemicals, railway or tramway locomotives or rolling stock and furniture, where its comparative advantage is sliding. More worrying are product categories where South Africa has lost its comparative advantage between 2002 and 2013 – these products include rubber, live trees, sugars, miscellaneous chemicals, works of art, tanning, essential oils, vegetable, fruits, nuts etc., special woven or tufted fabric and textile and clothing.

Identification of trade opportunities in manufactured products

South Africa witnessed rising export opportunities to the US in pulp of paper. US's demand for this product grew faster than the average in 2013 and South Africa managed to capture about 0.4 per cent of the increasing demand. The country has also gained more comparative advantage. This provides an opportunity to expand exports further.

However, while the market share for beverages (mainly wine) and explosives have increased, the demand for the products by the US has declined, and given the improved economic growth projection for the US, South Africa could experience more than average growth in the US's demand for these products in the near future, provided it can raise its competitiveness in beverages. Moreover, the country witnessed limited export opportunities with respect to vehicles, organic chemicals, furniture and tools.

Table 4.7
South Africa's top exports to the US (US\$ million)

Product code	Product	2007		2010		2013		Change (%)	
		Value	Share	Value	Share	Value	Share	2007-2010	2010-2013
	All products	7 529		7 183		6 895		-1.2	-1.0
'87	Vehicles other than railway, tramway	681	9.0	2 016	28.1	1 701	24.7	31.2	-4.1
'71	Pearls, precious stones, metals, coins	3 469	46.1	2 016	28.1	1 584	23.0	-12.7	-5.9
'72	Iron and steel	734	9.7	741	10.3	680	9.9	0.2	-2.1
'26	Ores, slag and ash	286	3.8	308	4.3	579	8.4	1.8	17.1
'84	Machinery, nuclear reactors, boilers,	435	5.8	377	5.2	453	6.6	-3.5	4.7
'29	Organic chemicals	251	3.3	292	4.1	322	4.7	3.9	2.5
'76	Aluminium and articles thereof	308	4.1	203	2.8	224	3.2	-9.8	2.4
'28	Inorganic chemicals, precious metal c	209	2.8	304	4.2	192	2.8	9.8	-10.8
'27	Mineral fuels, oils, distillation produc	288	3.8	60	0.8	123	1.8	-32.3	19.4
'88	Aircraft, spacecraft, and parts thereof	36	0.5	24	0.3	106	1.5	-9.7	45.4

Table 4.8
Revealed Comparative Advantage indices for SA exports to the US, 2002-2013

Product code	Product label	RCA			% change	
		2002	2008	2013	2002-2008	2008-2013
'81	Other base metals, cermets, articles thereof	2.56	0.67	7.14	-17%	48%
'71	Pearls, precious stones, metals, coins, etc	2.88	13.75	6.73	25%	-11%
'26	Ores, slag and ash	10.86	4.34	6.17	-12%	6%
'72	Iron and steel	5.96	4.17	4.51	-5%	1%
'28	Inorganic chemicals, precious metal compound, isotope:	14.44	4.80	4.06	-15%	-3%
'36	Explosives, pyrotechnics, matches, pyrophorics, etc	2.19	1.31	3.65	-7%	19%
'76	Aluminium and articles thereof	3.55	2.24	3.56	-6%	8%
'87	Vehicles other than railway, tramway	1.93	3.01	3.31	7%	2%
'86	Railway, tramway locomotives, rolling stock, equipment	4.09	1.68	2.32	-12%	6%
'08	Edible fruit, nuts, peel of citrus fruit, melons	2.62	1.39	2.32	-9%	9%
'29	Organic chemicals	1.45	1.61	1.89	2%	3%
'94	Furniture, lighting, signs, prefabricated buildings	8.60	3.09	1.88	-14%	-8%
'22	Beverages, spirits and vinegar	1.86	1.38	1.73	-4%	4%
'47	Pulp of wood, fibrous cellulosic material, waste etc	1.27	1.49	1.66	2%	2%
'25	Salt, sulphur, earth, stone, plaster, lime and cement	3.50	1.12	1.62	-15%	6%
'75	Nickel and articles thereof	0.75	0.57	1.51	-4%	18%
'82	Tools, implements, cutlery, etc of base metal	0.88	0.40	1.33	-11%	22%

Table 4.9
Export opportunities for SA manufactured products to the US (%)

Sector	Growth in US's demand		SA's market share		RCA 2013	Eport opportunities
	2011-2013	2013	2011	2013		
Vehicles	11.0	3.7	1.10	0.70	Increasing	Limited opportunities
Organic chemicals	4.2	0.3	0.68	0.60	Increasing	Limited opportunities
Explosives	2.8	1.5	0.74	0.91	Increasing	Falling opportunities
Furniture	7.6	7.4	0.04	0.02	Decreasing	Limited opportunities
Beverages	8.9	2.4	0.33	0.35	Decreasing	Falling opportunities
Pulp of paper	-1.5	7.9	0.42	0.77	Increasing	Rising opportunities
Tools of base metal	8.6	4.9	0.60	0.36	Increasing	Limited opportunities

Main products imported from the US

Amongst the top 10 imported products from the US, only minerals are primary products, the remainder of the imports are manufactured products (see table 4.10). South Africa's imports from the US grew on average by 2.4 per cent annually between 2010 and 2013 from US\$ 6 billion to US\$ 6.6 billion.

Machinery and vehicles were the most important imported products from the US – they grew annually by 2.7 per cent and 8.5 per cent between 2010 and 2013, respectively. South Africa imported just over 11 per cent of its machinery and 9 per cent of vehicles from the US.

Table 4.10
South Africa's top imports from the US (US\$ million)

Product code	Product	2007		2010		2013		Change (%)	
		Value	Share	Value	Share	Value	Share	2007-2010	2010-2013
	All products	6 166		5 982		6 566		-0.8	2.4
'84	Machinery, nuclear reactors, boilers, etc	1 654	26.8	1 565	26.2	1 737	26.5	-1.4	2.7
'87	Vehicles other than railway, tramway	702	11.4	603	10.1	835	12.7	-3.7	8.5
'90	Optical, photo, technical, medical, etc appara	479	7.8	530	8.9	541	8.2	2.5	0.5
'85	Electrical, electronic equipment	510	8.3	488	8.2	487	7.4	-1.1	0.0
'30	Pharmaceutical products	145	2.3	273	4.6	311	4.7	17.2	3.3
'38	Miscellaneous chemical products	177	2.9	222	3.7	280	4.3	5.9	6.0
'88	Aircraft, spacecraft, and parts thereof	370	6.0	255	4.3	261	4.0	-8.8	0.6
'27	Mineral fuels, oils, distillation products, etc	179	2.9	313	5.2	254	3.9	15.0	-5.1
'39	Plastics and articles thereof	186	3.0	163	2.7	218	3.3	-3.2	7.5
'40	Rubber and articles thereof	89	1.4	95	1.6	128	2.0	1.7	7.7

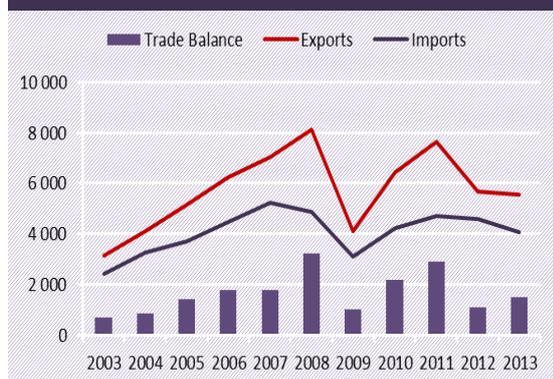
Mineral products were the eighth largest imported category from the US but there was a decline (5.1 per cent annually) between 2010 and 2013. The top 10 imported products accounted for 73 per cent of all imports in 2007 and this increased to 77 per cent in 2013.

South Africa-Japan trade

Trade trends

South Africa's merchandise exports to Japan have almost doubled from US\$ 3.1 billion in 2003 to US\$ 5.6 billion in 2013 (figure 4.6). On the other hand, the increase in imports remains 1.4 times less than that of the exports. This disparity is reflected in the country's trade balance, which has been consistently positive since 2003, reaching the peak in 2008 and 2011, before narrowing afterwards. In 2013 alone, trade balance improved by US\$404 million compared to 2012.

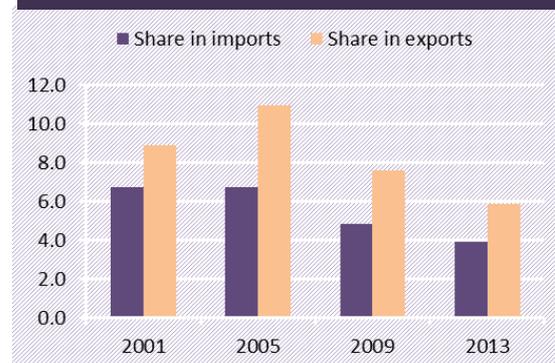
Figure 4.6
SA's trade with Japan, 2003-2013
(US\$ million)



Japan's market share

The proportion of the value of the exports to Japan and their relative share of South African total exports decreased from 6.7 per cent in 2001 to 3.9 per cent in 2013. At the same time, the share of country's imports from Japan also declined from 8.9 per cent to 5.8 per cent. Nonetheless, the country exports more to Japan than it imports.

Figure 4.7
Japan's share in SA trade, 2001-2013



Main products exported to Japan by SA

South Africa's exports to Japan declined on average by 2.2 per cent per annum (compound annual growth) between 2007 and 2010 from US\$ 7.0 billion to US\$ 5.6 billion. However, exports declined further on average by 3.5 per cent between 2010 and 2013 (see table 4.11). Almost all the top 10 export products to Japan are primary commodities and agricultural products, except for vehicles. The top 10 products accounted for 92 per cent of all

exports to Japan in 2007 and this increased to 94 per cent in 2010 as well as in 2013.

Almost half of exports to Japan in 2013 were in pearls (mainly platinum, 46 per cent), ores (18 per cent), vehicles (9 per cent) and iron and steel (6 per cent). The market shares for ores, cereals, vehicles and minerals increased in 2013 by 3.9 per cent, 3.1 per cent, 2.4 per cent and 0.4 per cent respectively.

Although the market remained relatively small, cereals and minerals were the fastest growing products between 2010 and 2013, achieving compound annual growth of 71 per cent and 10 per cent. However, negative export growth is mainly witnessed for aluminium, wood, iron and steel and pearls.

Revealed Comparative Advantage (RCA) with Japan

The country has comparative advantage in most of the products that top the export list (table 4.12). It is worth noting that while South Africa in 2008 had comparative disadvantage in cereals, it managed to turn its fortunes in 2013. Of the products that make the top 10 export list, the country has managed to gain comparative advantage only in nickel and vegetable fruits.

However, the country is losing ground (though they still have comparative advantage) in most of the products exported to Japan. More worrying are product categories where South Africa has lost its comparative advantage between 2002 and 2013 – these products include furniture, railway, tramway locomotives or rolling stock equipment, inorganic chemicals, fish, crustaceans, etc., oil seed, oleagic, etc., raw hides, bird skin and stone, plaster, cement, etc..

Identification of trade opportunities in Manufactured Products

In terms of manufactured products, South Africa has only three products that it has a comparative advantage in, as shown in Table 4.12 below (cereals, sugar and vehicles). Most comparative advantage with Japan was in primary commodities with little or no value addition. Unfortunately, despite increase in the market share for these products, the demand

for the products by Japan has contracted. Hence, there were no export opportunities for manufactured products to Japan given the loss in comparative advantage over the years.

Main products imported from Japan

Amongst the top 10 imported products from Japan, only minerals and iron and steel are primary products, the remainder are manufactured products (see table 4.13). At 1.0 per cent South Africa's imports from Japan moderated between 2010 and 2013 from US\$ 4.2 billion to US\$ 4.1 billion. Machinery and vehicles were the most important imported products from Japan. The top 10 imported products accounted for more than 60 per cent of all imports since 2007.

Conclusion

South Africa's trade with the EU, US and Japan has been performing below its potential, owing to a slower recovery in these economies. Consequently, the manufactured products that South Africa needs to prioritise to increase the pace of transformation are very limited. However, the stronger recovery over the period ahead presents new opportunities to increase exports, provided that the country can raise competitiveness (by re-looking at cost structure, R&D and innovation), particularly in those manufactured products which are in demand but in which it is losing or has lost comparative advantage, such products include furniture, beverages (mainly wine), paper and paperboard and tools (with respect to the EU) and beverages (mainly wine), clothing and textile, miscellaneous chemicals, works of art, carpets, essential oils and fish, crustaceans, etc. (US).

The country can also boost exports in those products that are in demand in which it has gained more comparative advantage, such as vehicles, organic chemicals and pulp of paper (with respect to the EU) and pulp of paper and explosives (US). Unfortunately, the demand for most of the South Africa's manufactured exports to Japan has contracted. But given the stronger economic growth projection over the coming years, the country can look to increase exports to Japan in vehicles, cereals and wood products.

The new trade pact under EPA will expand market access into the EU for the benefited agricultural and mineral sectors.

Table 4.11
South Africa's top exports to Japan (US\$ million)

Product code	Product	2007		2010		2013		Change (%)	
		Value	Share	Value	Share	Value	Share	2007-2010	2010-2013
	All products	7 039		6 428		5 570		-2.2	-3.5
'71	Pearls, precious stones, metals, coins, etc	3 333	47.3	3 320	51.7	2 574	46.2	-0.1	-6.2
'26	Ores, slag and ash	504	7.2	910	14.2	1 009	18.1	15.9	2.6
'87	Vehicles other than railway, tramway	965	13.7	427	6.6	500	9.0	-18.4	4.0
'72	Iron and steel	532	7.6	503	7.8	353	6.3	-1.4	-8.5
'76	Aluminium and articles thereof	525	7.5	450	7.0	254	4.6	-3.8	-13.3
'10	Cereals	0	0.0	23	0.4	196	3.5	-	71.2
'44	Wood and articles of wood, wood charcoal	268	3.8	198	3.1	145	2.6	-7.3	-7.5
'75	Nickel and articles thereof	239	3.4	100	1.6	85	1.5	-19.5	-4.0
'27	Mineral fuels, oils, distillation products, etc	40	0.6	36	0.6	54	1.0	-2.3	10.7
'20	Vegetable, fruit, nut, etc food preparations	42	0.6	49	0.8	43	0.8	3.8	-3.4

Table 4.12
Revealed Comparative Advantage indices for SA exports to Japan, 2002-2013

Product code	Product label	RCA			% change	
		2002	2008	2013	2002-08	2008-13
'71	Pearls, precious stones, metals, coins, etc	0.02	21.55	13.54	163%	-7%
'26	Ores, slag and ash	32.45	13.66	13.30	-12%	0%
'75	Nickel and articles thereof	14.30	5.90	10.19	-12%	10%
'81	Other base metals, cermet, articles thereof	2.22	1.54	6.15	-5%	26%
'10	Cereals	1.16	0.00	5.21	-58%	257%
'76	Aluminium and articles thereof	16.57	6.05	5.00	-13%	-3%
'44	Wood and articles of wood, wood charcoal	11.67	5.19	3.55	-11%	-6%
'72	Iron and steel	7.02	3.06	2.90	-11%	-1%
'20	Vegetable, fruit, nut, etc food preparations	5.87	1.42	2.28	-18%	8%
'17	Sugars and sugar confectionery	6.36	2.39	1.52	-13%	-7%
'08	Edible fruit, nuts, peel of citrus fruit, melons	3.40	1.11	1.38	-15%	4%
'51	Wool, animal hair, horsehair yarn and fabric thereof	1.99	0.63	1.24	-15%	12%
'87	Vehicles other than railway, tramway	2.04	1.29	1.21	-6%	-1%
'25	Salt, sulphur, earth, stone, plaster, lime and cement	1.03	0.29	0.91	-16%	21%
'47	Pulp of wood, fibrous cellulosic material, waste etc	2.32	0.25	0.83	-27%	22%

Table 4.13
South Africa's top imports from Japan (US\$ million)

Product code	Product	2007		2010		2013		Change (%)	
		Value	Share	Value	Share	Value	Share	2007-2010	2010-2013
	All products	5 249		4 247		4 077		-5.2	-1.0
'84	Machinery, nuclear reactors, boilers, etc	1 007	19.2	811	19.1	860	21.1	-5.3	1.5
'87	Vehicles other than railway, tramway	1 377	26.2	1 206	28.4	847	20.8	-3.3	-8.5
'85	Electrical, electronic equipment	304	5.8	351	8.3	218	5.3	3.7	-11.2
'40	Rubber and articles thereof	132	2.5	154	3.6	156	3.8	3.9	0.3
'72	Iron and steel	24	0.5	58	1.4	138	3.4	24.1	24.4
'90	Optical, photo, technical, medical, etc apparatus	115	2.2	115	2.7	118	2.9	0.0	0.8
'27	Mineral fuels, oils, distillation products, etc	92	1.8	4	0.1	60	1.5	-53.5	92.9
'38	Miscellaneous chemical products	32	0.6	34	0.8	38	0.9	1.7	2.4
'39	Plastics and articles thereof	38	0.7	42	1.0	33	0.8	2.9	-6.2
'32	Tanning, dyeing extracts, tannins, derivs, pigments et	27	0.5	31	0.7	31	0.8	2.9	0.1

Chapter 5

Focus on Africa

South Africa's economic prospects have become increasingly intertwined with those of the rest of the African continent which is forecast to remain the second fastest growing region. Evidence has shown that the number of middle-class households in 11 Sub-Saharan African countries: Angola, Ethiopia, Ghana, Kenya, Mozambique, Nigeria, South Sudan, Sudan, Tanzania and Uganda are expected to boom in the next 16 years from 15 million in 2014 to over 40-million by 2030 (Standard Bank, 2014). Nigeria, which has the largest African population, is leading the growth of new middle-class households on the continent with an estimated 7.6 million to be added in the next 16 years. Nigeria's middle class grew by 600 per cent between 2000 and 2014 giving the country 4.1 million middle-class households in 2014, which is 11 per cent of its total population (Standard Bank, 2014). The growing number of relatively wealthy consumers in Sub-Saharan Africa will become a key source of demand for South African goods.

There are eight regional economic communities recognised by the African Union but the most prominent and significant ones for South Africa in terms of trade are; the five nation East African Community; the 19 member Common Market for Eastern and Southern Africa (COMESA); the 15 member Southern African Development Community (SADC); and the 15 member Economic Community of West African (ECOWAS). In addition, the negotiations of the COMESA-EAC-SADC Tripartite Free Trade Agreement have commenced. The aim of the tripartite FTA is to promote regional economic growth by creating a conducive environment for regional trade to take place and deepen integration in Africa. Trade between the regional blocs is not uniform and therefore the need to understand the regional dynamics and trading patterns of each trading bloc.

Whilst we acknowledge that some of the countries belong to more than one trading

bloc, the analysis that follows paint a picture of the respective importance of each trading bloc with South Africa. In this chapter, we consider some of the products and markets the country can exploit so as to maximise the opportunities inherent in Africa.

Africa's economic outlook

African economies showed a remarkable resilience during the 2009 global recession. Nonetheless, the impact of the flagging world economy has taken a toll on Africa's growth. In some countries this has been aggravated by political conflicts and social tensions. As a result, Africa's average GDP growth has remained lower than before the global recession. In 2013, Africa maintained an average growth rate of about 4%. This compares to 3% for the global economy and underscores again the continent's resilience to global and regional headwinds.

Africa's growth is projected to accelerate to 4.8 per cent in 2014 and 5.7 per cent in 2015 (table 5.1). Looking at regional level, West and East Africa are projected to be the fastest growing regions. Overall, Sub-Saharan Africa is projected to grow by 6.9 per cent by 2015. An assumption underlying this overall favourable outlook is that the world economy will strengthen and that political and social stability in some African countries, which have been affected by conflicts, will improve (AfDB et al, 2013).

Table 5.1
Africa GDP growth outlook (2012-2015)

Year/Region	2012	2013	2014	2015
Africa	6.4	3.9	4.8	5.7
Central Africa	5.8	3.7	6.2	5.7
East Africa	3.9	6.2	6	6.2
North Africa	9.4	1.9	3.1	5.5
Southern Africa	3.3	3.0	4.0	4.4
West Africa	6.9	6.7	7.2	7.1
<i>Sub-Saharan Africa</i>	<i>4.9</i>	<i>5.0</i>	<i>6.8</i>	<i>6.9</i>

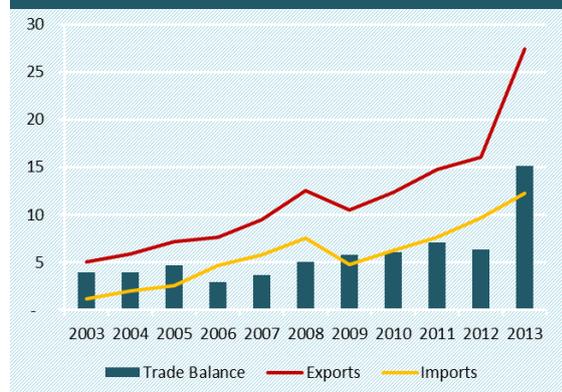
Source: *African Economic Outlook 2014*

South Africa's trade with Africa

Trade Trends

South Africa's merchandise exports (imports) to (from) the rest of Africa have been gradually increasing since 2003 with the exception for 2009). However, the increase in exports has been relatively greater than that of the imports on average (figure 5.1). This disparity is reflected in the country's trade balance, which has consistently been positive and reached a peak of US\$15 billion in 2013.

Figure 5.1
SA's trade with Africa, 2003-2013 (US\$ billion)



Exports were valued at US\$ 27.4 billion in 2013 up from US\$ 7.7 billion in 2006 (an average annual growth rate of 17 per cent). SADC accounted for 68.5 per cent of all South Africa exports to Africa in 2006 and this increased to 86.2 per cent in 2013 – driven mainly by Botswana (16.8 per cent), Namibia (15.5 per cent), Mozambique (10.3 per cent), Zambia (9.9 per cent) and Zimbabwe (8.8 per cent). The second largest trading bloc is COMESA with exports fluctuating over the period, for instance it accounted for 52.3 per cent in 2006 and this declined to 37.6 per cent in 2013. ECA and ECOWAS' contribution to South Africa's exports remain largely below 15 per cent (figure 5.2).

On the other hand, imports from Africa grew at 13 per cent from US\$ 4.7 billion in 2006 to US\$ 12.3 billion in 2013. South Africa sources a greater proportion from SADC (60.3 per cent in 2013), followed by ECOWAS (35 per cent in 2013), COMESA (19.4 per cent) and ECA (1.1 per cent) (figure 5.3). Nigeria accounts for 29.5 per cent of all imports from Africa

followed by Angola (16 per cent), Mozambique (10.4 per cent) and then Swaziland (9.5 per cent). Imports from Nigeria, Angola and Mozambique are largely crude petroleum products.

Figure 5.2
Proportion of exports to Africa by regional trading bloc, 2006-2013

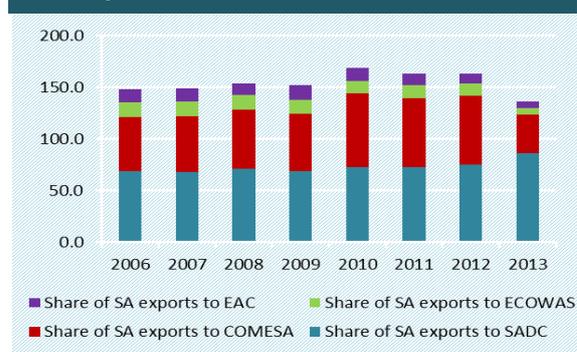
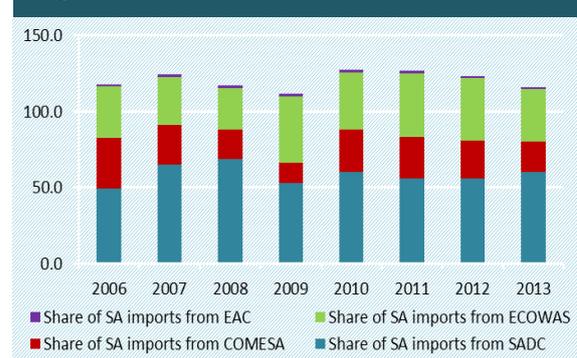


Figure 5.3
Proportion of imports from Africa by regional bloc, 2006-2013



The increase in exports over imports is reflected in the country's trade balance, which has consistently been positive, reaching a peak in 2013. Overall, it is clear that SADC is the most significant trading bloc with South Africa both on exports and imports. ECOWAS occupies the second position in terms of imports largely due to crude oil, having overtaken COMESA.

In terms of intra-country trade within regional blocs, SADC trades more with itself (US\$ 41.8 billion) followed by COMESA (US\$10.9 billion) with EAC trading the least amongst its member countries (US\$2.2 billion). The same trend can also be observed for trade among regional blocs with SADC exporting (importing) US\$18.6 billion (US\$12.8 billion)

worth of goods to (from) COMESA based on 2013 figures. Limited trade is observed between EAC and ECOWAS and between ECOWAS and COMESA (see table 5.2). South Africa's trade with each trading bloc will be discussed in detail later in this chapter, but it is clear that SADC and COMESA are the most important partners for South Africa's exports whilst ECOWAS is the second most important partner in terms of imports after SADC.

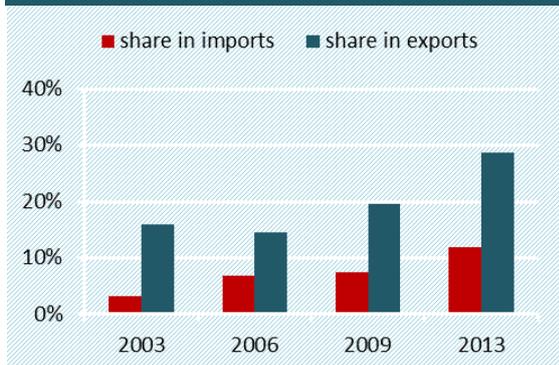
Table 5.2
Intra-trade by regional trading blocs, 2013
(US\$ billion)

Destination	Country/Region	Source				South Africa
		SADC	COMESA	ECOWAS	EAC	
SADC		41.8	12.8	7.2	3.2	23.6
COMESA		18.6	10.9	0.24	4.2	10.3
ECOWAS		2.6	0.38	9.4	0.03	1.7
EAC		2.7	2.5	0.06	2.2	1.5
South Africa		7.4	2.4	4.3	0.13	-

Africa's market share

The relationship between the value of SA exports to rest of Africa and their relative share of South African global exports has been increasing from 16 per cent in 2003 to 28.8 per cent in 2013. The share of rest of Africa's imports relative to South Africa's global imports has been gradually increasing from 3.3 per cent in 2003 to 11.8 per cent in 2013 (figure 5.4).

Figure 5.4
Africa's share in SA trade, 2003-2013



In fact, South Africa's trade with the rest of Africa has increased dramatically than with the rest of the world, and most of such trade is in manufactures, affording a substantial market for value-added goods and opportunity to accelerate the pace of transformation.

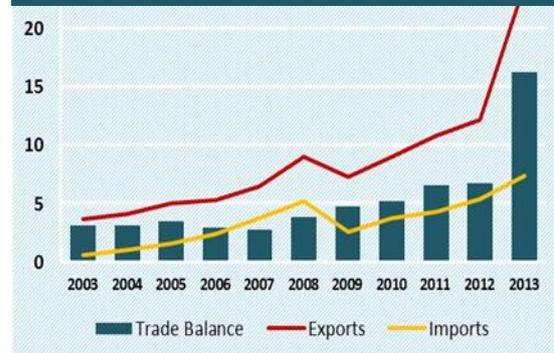
South Africa's trade with SADC

Trade Trends

South Africa's merchandise exports (imports) to (from) SADC have been gradually increasing since 2003 with the exception of 2009 where both imports and exports declined. The impact of the global recession contributed to this decline. Exports have been relatively growing at faster pace compared to imports especially after 2010 (figure 5.5). This disparity is reflected in the country's trade balance, which has consistently been positive and reached a peak of US\$16.2 billion in 2013 (or US\$ 1.1 billion greater than that achieved with the rest of Africa).

Exports increased from US\$ 3.6 billion in 2003 to US\$23.6 billion in 2013. For 2013, Botswana was the recipient of the bulk of South Africa's exports amongst the SADC countries. Botswana contributed 19.5 per cent (or US\$4.6 billion), Namibia 17.9 per cent (or US\$4.2 billion) and Mozambique 12 per cent (or US\$2.8 billion). On the other hand, imports grew from US\$ 563 million in 2003 to US\$7.4 billion in 2013 (table 5.3).

Figure 5.5
SADC's trade with SA, 2003-2013 (US\$ billion)



At the same time, South Africa imported the most from Angola (US\$1.96 billion or 27.7 per cent) followed by Mozambique (US\$1.27 billion or 18 per cent) and then Swaziland

(US\$1.17 billion or 16.5 per cent). South Africa has imported the least among the SADC members from the Seychelles (table 5.3).

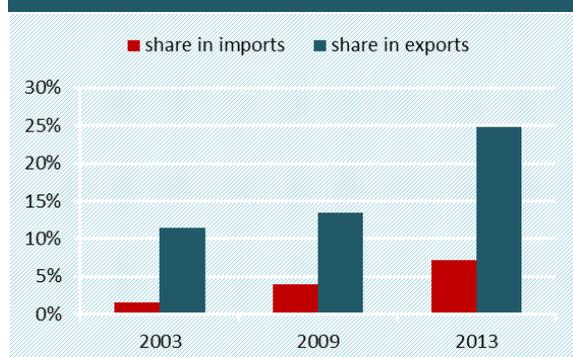
Table 5.3
SADC's share in SA trade by country, 2013

Country	Exports 2013	Share in exports 2013	Imports 2013	Share in imports 2013
SADC Total	23 630 528		7 067 155	
Botswana	4 602 432	19.5%	525 396	7.4%
Namibia	4 237 707	17.9%	689 092	9.8%
Mozambique	2 830 787	12.0%	1 270 420	18.0%
Zambia	2 711 156	11.5%	371 453	5.3%
Zimbabwe	2 399 408	10.2%	342 667	4.8%
Swaziland	1 515 987	6.4%	1 165 865	16.5%
Lesotho	1 418 056	6.0%	236 678	3.3%
DRC	1 364 518	5.8%	12 437	0.2%
Angola	1 004 189	4.2%	1 960 887	27.7%
Malawi	513 459	2.2%	68 325	1.0%

SADC's market share

The relationship between the value of South Africa's exports to SADC and their relative share of South African global exports has been increasing from 11.5 per cent in 2003 to 24.8 per cent in 2013. The share of rest of Africa's imports relative to South Africa's global imports has been gradually increasing from 1.6 per cent in 2003 to 7.1 per cent in 2013 (figure 5.6). This makes SADC the largest export destination for South Africa in 2013.

Figure 5.6
SADC's share in SA trade, 2003-2013



Main products exported to SADC by SA

South Africa's exports to SADC grew on average by 9 per cent per annum (compound

annual growth) between 2007 and 2010 from US\$ 6.46 billion to US\$ 8.95 billion. The pace of exports growth accelerated further between 2010 and 2013 achieving compound annual growth of 27 per cent (table 5.4).

Amongst the top 10 export products to SADC, only 4 are primary/resource based commodities namely iron and steel, articles of iron or steel, mineral fuels and pearls. The remainder of the exports are manufactured products which show that South Africa's trade with SADC is concentrated in manufactured goods. This trend is identical to the overall trade patterns for South Africa and the rest of Africa as discussed earlier. The top 10 products accounted for 64.3 per cent of all exports to SADC in 2007 and this declined marginally to 58.9 per cent in 2013.

Mineral fuels, machinery and vehicles are the leading export products to SADC in 2013. Between 2007 and 2013, the share of mineral fuels exported to SADC increased from 11.6 per cent or US\$ 746 million to 13.9 per cent or US\$ 3.3 billion. Between 2007 and 2010, machinery products were the leading exports to Africa. In terms of export growth, all the top 10 export products witnessed positive growth between 2007 and 2013 with the exception of pearls which declined on average by 6 per cent per annum between 2007 and 2010 before rebounding to achieve an average annual growth of 258 per cent between 2010 and 2013.

Revealed Comparative Advantage

Having identified the top export industries and products, the next step is to evaluate for which of the products South Africa has comparative advantage with respect to SADC. South Africa has comparative advantage in 47 products and table 5.5 just indicates products where SA has the greatest RCA. The greatest comparative advantage is witnessed in explosives, furniture, milling products, sugars, soaps and fertiliser. Amongst the top 10 export products to SADC in 2013, South Africa has comparative advantage in 7 of the products namely iron and steel, vehicles, plastics, machinery, articles of iron or steel, cereals and paper (including paperboard). Interestingly, South Africa does not have comparative

advantage in its top export product, mineral fuels, electrical equipment and pearls.

South Africa has managed to gain comparative advantage in some of the products between 2006 and 2013 and these include; residues (wastes of food industry) which moved from an RCA of 0.7 to 1.5; glass and glassware improved from 0.8 to 1.3; vehicles from 0.8 to 1.3. Other products that South Africa improved its RCA are wood, meat (including fish), footwear (including gaiters), bird skin, meat and offal and miscellaneous manufactured articles. Improvement in RCA was also observed in beverages, edible vegetables, other made textile articles, railway (tramway locomotives) and dairy products.

South Africa is losing ground (though it still has comparative advantage) in explosives, sugars, fertilisers, tobacco, cereals, articles of iron or steel, pulp and paper, rubber, printed books, tools and implements, miscellaneous chemical products. More worrying are product categories where South Africa has lost its comparative advantage between 2006 and 2013 – these products include, cocoa, umbrellas, laminated textile, tin, albuminoids, aircraft and other base metals

Identification of trade opportunities in manufactured products

Again we follow the same framework discussed in Chapter 3 to detect manufactured products that South Africa can take advantage of. The results are presented in table 5.6.

Table 5.4
South Africa's top exports to SADC, 2007-2013 (US\$ thousand)

Product code	Product label	2007		2010		2013		Change (%)	
		Value	Share	Value	Share	Value	Share	2007-10	2007-10
TOTAL	All products	6 456 586		8 950 433		23 630 528		9%	27%
'27	Mineral fuels, oils, distillation products	746 440	11.6%	941 150	10.5%	3 293 250	13.9%	6%	37%
'84	Machinery, nuclear reactors, boilers, etc	1 028 894	15.9%	1 361 692	15.2%	2 857 675	12.1%	7%	20%
'87	Vehicles other than railway, tramway	571 803	8.9%	643 455	7.2%	2 218 414	9.4%	3%	36%
'85	Electrical, electronic equipment	459 721	7.1%	539 395	6.0%	1 395 130	5.9%	4%	27%
'73	Articles of iron or steel	432 032	6.7%	666 663	7.4%	1 126 180	4.8%	11%	14%
'39	Plastics and articles thereof	276 934	4.3%	400 260	4.5%	852 866	3.6%	10%	21%
'72	Iron and steel	453 473	7.0%	510 926	5.7%	761 296	3.2%	3%	10%
'71	Pearls, precious stones, metals, coins, etc	3 790	0.1%	3 021	0.0%	494 319	2.1%	-6%	258%
'48	Paper and paperboard, pulp, paper & board	147 825	2.3%	258 526	2.9%	477 572	2.0%	15%	17%
'10	Cereals	31 620	0.5%	76 944	0.9%	444 337	1.9%	25%	55%

Table 5.5
Revealed Comparative Advantage Indices for SA exports to SADC, 2006-2013

Product code	Product label	RCA			% change	
		2006	2010	2013	2006-10	2010-13
'36	Explosives, pyrotechnics	33.0	27.4	18.0	-4%	-10%
'94	Furniture, lighting, signs, prefab buildings	19.2	16.7	17.3	-3%	1%
'11	Milling products, malt, starches	5.4	10.9	9.3	15%	-4%
'17	Sugars and sugar confectionery	8.1	6.6	6.2	-4%	-2%
'34	Soaps, lubricants, waxes, candles	5.6	6.8	5.9	4%	-4%
'31	Fertilizers	10.6	5.2	4.8	-13%	-2%
'25	Salt, sulphur, plaster, lime and cement	2.8	4.1	4.3	8%	1%
'21	Miscellaneous edible preparations	3.6	4.6	3.9	5%	-5%
'24	Tobacco and manufactured tobacco	3.9	1.7	3.3	-15%	18%
'22	Beverages, spirits and vinegar	2.3	3.6	3.0	10%	-5%
'20	Vegetable, fruit, nut, etc food preparations	2.0	3.3	2.9	11%	-3%
'10	Cereals	6.0	1.5	2.8	-24%	16%
'73	Articles of iron or steel	3.0	4.5	2.8	9%	-12%
'33	Essential oils, perfumes, cosmetics	2.9	2.7	2.7	-1%	0%
'19	Cereal, flour, starch, milk preparations	1.4	2.6	2.5	14%	-1%

Table 5.6
Export opportunities for SA manufactured products to SADC (%)

Sector	Growth in SADC's demand		SA's market share		RCA 2013	Eport opportunities
	2011-2013	2013	2011	2013		
Explosives	15.7	9.4	57.2	46.7	Decreasing	Limited opportunities
Furniture	9.5	1.0	18.9	14.4	Decreasing	Limited opportunities
Sugars and sugar confectionary	11.1	7.8	24.5	26.0	Decreasing	Falling opportunities
Fertilizers	61.0	37.9	7.0	14.7	Decreasing	Falling opportunities
Salt, sulphur, etc.	13.6	14.3	21.4	15.8	Increasing	Lost opportunities
Beverages	10.8	6.0	24.0	21.8	Increasing	Limited opportunities
Cereals	16.1	2.5	11.1	13.1	Decreasing	Falling opportunities
Cereal, flour, starch, milk preparations	12.7	4.1	24.7	25.3	Increasing	Falling opportunities
Tanning, dyeing extracts, tannins, derivs, pigments etc	5.9	2.7	21.3	20.7	Increasing	Limited opportunities
Coffee	6.2	3.9	27.5	29.7	Increasing	Falling opportunities
Rubber	11.8	1.7	15.4	15.4	Decreasing	Limited opportunities
Printed books	2.5	12.0	16.0	10.9	Decreasing	Lost opportunities
Tools, implements, cutlery, etc of base metal	9.6	3.3	15.4	13.5	Decreasing	Limited opportunities
Plastics	9.8	3.1	16.1	16.0	Decreasing	Limited opportunities
Inorganic chemicals	10.7	13.0	7.7	6.2	Decreasing	Lost opportunities
Footwear	12.3	9.8	13.1	11.0	Increasing	Limited opportunities

Evidence shows that South Africa lost export opportunities to SADC in salt, sulphur, etc., printed books and inorganic chemicals. The country did not manage to capture a portion of the increasing SADC's demand for these products in 2013. Yet there was an opportunity to expand exports further.

However, while the market shares for sugars, fertilizers, cereals, cereals, flour, starch, etc. and coffee have increased, the demand for the products by SADC has declined, but given the rapid economic growth projection and the possibility for a Tripartite FTAt, South Africa could see more than average growth in the SADC's demand for these products in the near future, provided it can raise competitiveness in sugar, fertilizers and cereals. Moreover, the country witnessed limited export opportunities with respect to explosives, furniture,

beverages, tanning, rubber, tools, plastics and footwear.

Main products imported from SADC

Amongst the top 10 imported products from SADC, four are primary products such as pearls, copper, ores and mineral fuels. The remainder of the imports are manufactured products (see table 5.7). South Africa's imports from SADC grew on average by 18.4 per cent annually between 2010 and 2013 from US\$ 3.8 billion to US\$ 7.4 billion. Mineral fuels are still the single most important imported product from SADC accounting for 43.3 per cent of all imports in 2013. Mineral fuels grew annually by 6.6 per cent between 2010 and 2013. Essential oils was the second most imported product in 2013 despite the fact that in 2007 it was not amongst the top 10 imported products from SADC.

Table 5.7
South Africa's top imported products from SADC, 2007-2013 (US\$ thousand)

Product code	Product label	2007		2010		2013		Change (%)	
		Value	Share	Value	Share	Value	Share	2007-10	2010-13
TOTAL	All products	3 742 525		3 756 131		7 391 469		0.1%	18.4%
'27	Mineral fuels, oils, distillation products, etc	1 926 131	51.5%	2 479 206	66.0%	3 200 528	43.3%	6.5%	6.6%
'33	Essential oils, perfumes, cosmetics, toileteries	463	0.0%	1 284	0.0%	357 372	4.8%	29.0%	308.4%
'71	Pearls, precious stones, metals, coins, etc	383 360	10.2%	354 939	9.4%	284 161	3.8%	-1.9%	-5.4%
'26	Ores, slag and ash	330 883	8.8%	9 202	0.2%	273 729	3.7%	-59.2%	133.5%
'17	Sugars and sugar confectionery	14 918	0.4%	28 606	0.8%	252 924	3.4%	17.7%	72.4%
'74	Copper and articles thereof	141 813	3.8%	174 132	4.6%	224 047	3.0%	5.3%	6.5%
'61	Articles of apparel, accessories, knit or crochet	28 902	0.8%	52 899	1.4%	220 264	3.0%	16.3%	42.8%
'62	Articles of apparel, accessories, not knit or crochet	40 010	1.1%	43 465	1.2%	216 518	2.9%	2.1%	49.4%
'38	Miscellaneous chemical products	716	0.0%	1 994	0.1%	199 635	2.7%	29.2%	216.3%
'85	Electrical, electronic equipment	55 510	1.5%	53 850	1.4%	180 228	2.4%	-0.8%	35.3%

The top 10 imported products accounted for 73.2 per cent of all imports from SADC in 2013 down from a peak of 85.2 per cent in 2010 – this indicates that South Africa’s imports from SADC are concentrated in a very few products.

South Africa Trade with ECOWAS

Trade trends

South Africa’s merchandise exports (imports) to (from) ECOWAS have been gradually increasing since 2006 with the exception of 2009 and 2013 where exports declined. Exports have been relatively growing a slower pace compared to imports especially after 2010 (figure 5.7). This disparity is reflected in the country’s trade balance, which has consistently been negative and reached a peak of US\$2.5 billion in 2013.

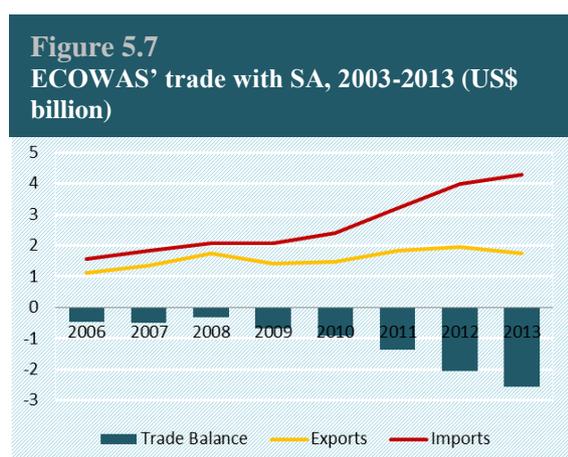


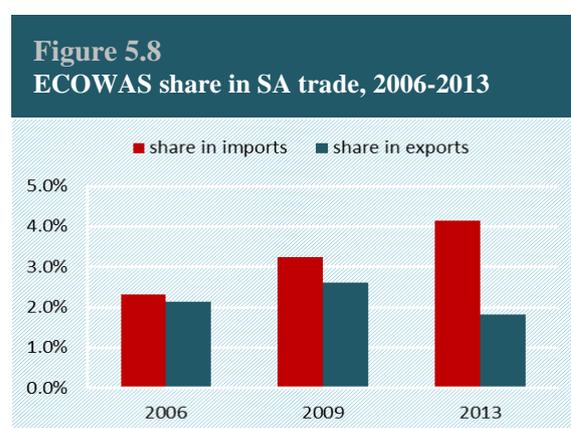
Table 5.8
ECOWAS’ trade with SA by country, 2013 (US\$ thousand)

Country	Exports 2013	Share of exports 2013	Imports 2013	Share of imports 2013
ECOWAS Total	1 742 607		4 289 387	
Nigeria	807 818	46.4%	3 616 782	84.3%
Ghana	398 297	22.9%	628 765	14.7%
Sierra Leone	103 509	5.9%	10 334	0.2%
Mali	95 181	5.5%	524	0.0%
Côte d'Ivoire	92 434	5.3%	21 785	0.5%
Senegal	92 344	5.3%	2 109	0.0%
Benin	33 943	1.9%	4 284	0.1%
Burkina Faso	33 784	1.9%	265	0.0%
Togo	29 079	1.7%	247	0.0%
Guinea	27 065	1.6%	338	0.0%
Liberia	15 672	0.9%	1 070	0.0%
Niger	7 776	0.4%	2 138	0.0%
Gambia	4 273	0.2%	626	0.0%
Cabo Verde	762	0.0%	49	0.0%
Guinea-Bissau	670	0.0%	71	0.0%

Exports were valued at US\$ 1.74 billion in 2013 and Nigeria contributed 46 per cent followed by Ghana (23 per cent) and then Sierra Leone (6 per cent). In terms of imports, Nigeria accounted for 84.3 per cent of all imports from ECOWAS (table 5.8).

ECOWAS market share

The relationship between the value of South Africa’s exports to ECOWAS and their relative share of South African global exports has been falling from 2.1 per cent in 2006 to 1.8 per cent in 2013. On the other hand, the share of ECOWAS imports relative to South Africa’s global imports has been gradually increasing from 2.3 per cent in 2006 to 4.1 per cent in 2013 (figure 5.8).



Main products exported to ECOWAS by SA

South Africa’s exports to ECOWAS grew on average by 2.5 per cent per annum (compound annual growth) between 2007 and 2010 from US\$1.3 billion to US\$ 1.49 billion. The pace of exports growth improved between 2010 and 2013 achieving compound annual growth of 4 per cent (table 5.9).

Amongst the top 10 export products to ECOWAS, only 3 are primary/resource based commodities namely iron and steel, articles of iron or steel and mineral fuels. The remainder of the exports are manufactured products which show that South Africa’s trade with ECOWAS is concentrated in manufactured goods. The top 10 products accounted for 68.9 per cent of all exports to ECOWAS in 2007 and this increased marginally to 73.8 per cent in 2013.

Table 5.9
South Africa's top exported products to ECOWAS, 2007-2013 (US\$ thousand)

Product code	Product label	2007		2010		2013		Change (%)	
		Value	Share	Value	Share	Value	Share	2007-10	2010-13
TOTAL	All products	1 347 520		1 488 426		1 742 607		2.5%	4.0%
'87	Vehicles other than railway, tramway	149 600	11.1%	170 361	11.4%	312 871	18.0%	3.3%	16.4%
'84	Machinery, nuclear reactors, boilers, etc	145 081	10.8%	193 146	13.0%	238 690	13.7%	7.4%	5.4%
'39	Plastics and articles thereof	60 346	4.5%	118 264	7.9%	157 699	9.0%	18.3%	7.5%
'85	Electrical, electronic equipment	115 140	8.5%	94 458	6.3%	115 187	6.6%	-4.8%	5.1%
'72	Iron and steel	66 867	5.0%	186 491	12.5%	110 925	6.4%	29.2%	-12.2%
'73	Articles of iron or steel	115 901	8.6%	97 273	6.5%	96 397	5.5%	-4.3%	-0.2%
'08	Edible fruit, nuts, peel of citrus fruit	24 588	1.8%	39 350	2.6%	90 292	5.2%	12.5%	23.1%
'27	Mineral fuels, oils, distillation products	144 990	10.8%	93 061	6.3%	72 488	4.2%	-10.5%	-6.1%
'48	Paper and paperboard, pulp, paper & board	68 575	5.1%	74 668	5.0%	46 628	2.7%	2.2%	-11.1%
'21	Miscellaneous edible preparations	37 157	2.8%	45 752	3.1%	44 639	2.6%	5.3%	-0.6%

In terms of the leading export products to ECOWAS, there is a marked difference with SADC and the rest of Africa. Vehicles, machinery, plastics and electronic equipment are the major export products. Between 2007 and 2013, the share of vehicles increased from 11.1 per cent or US\$ 149.6 million to 18 per cent or US\$ 312.8 million. The countries driving exports of vehicles are Nigeria (US\$ 216.9 million or 69 per cent) and Ghana (US\$ 62.2 million or 20 per cent of vehicle exports to ECOWAS). It is interesting to note that in 2007, mineral fuels (more specifically processed petroleum oils) used to be the leading exports to ECOWAS and in 2013 it has moved to 8th. The value of exports has also declined between 2007 and 2013 for the following products; electronic equipment, articles of iron or steel, mineral fuels, paper and paperboard. This implies that ECOWAS might be sourcing these products elsewhere.

Revealed Comparative Advantage

South Africa has comparative advantage in 28 products and table 5.10 just indicates products where SA has the greatest RCA. The greatest comparative advantage is witnessed in explosives, furniture, edible fruit, miscellaneous edible preparations, beverages, and tobacco.

Amongst the top 10 export products by value, South Africa has comparative advantage in 8 of the products with the exception of

electronic equipment and mineral fuels. This suggests that there seems to be some degree of alignment between top export products and their relative comparative advantage.

South Africa has managed to gain comparative advantage in some of the products between 2006 and 2013 and these include; vehicles (from 0.9 to 2.4), machinery (0.8 to 1.2), soap (0.9 to 3), photographic goods (0.2 to 1.9) and albuminoids (0.8 to 1.4).

South Africa is losing ground (though it still has comparative advantage) in explosives, furniture, sugars, manufactured tobacco, articles of iron or steel, aluminium, tools and printed books. More worrying are product categories where South Africa has lost its comparative advantage between 2006 and 2013 – these products include inorganic chemicals and mineral fuels.

Identification of trade opportunities in manufactured products

South Africa witnessed rising export opportunities in eight manufactured products, soaps, lubricant etc., plastics, photographic or cinematographic goods, albuminoids, machinery, headgear, rubber and tools (table 5.11). ECOWAS's demand for these products grew faster than the average and South Africa managed to capture a portion of the increasing demand. This provides an opportunity to expand exports further.

Evidence also shows that South Africa lost export opportunities to ECOWAS in explosives, furniture, paper and paperboards and tanning, dyeing etc. (although it is losing competitiveness in the first three products). The country did not manage to capture a portion of the increasing ECOWAS's demand in these products in 2013. Yet there was an opportunity to expand exports further.

However, while the market share for milling products have increased, the demand for the products by ECOWAS has declined, but given the rapid economic growth projection for the region, South Africa could still witness more than average growth in ECOWAS's demand for this product in the near future. It is interesting to note that South Africa did not witness any limited export opportunities to ECOWAS.

Table 5.10
Revealed Comparative Indices for SA exports to ECOWAS, 2006-2013

Product code	Product label	RCA			% Change	
		2006	2010	2013	2006-10	2010-13
'36	Explosives, pyrotechnics	23.3	23.9	20.4	0%	-4%
'94	Furniture, lighting, prefabricated buildings	21.6	16.3	12.4	-5%	-7%
'08	Edible fruit, nuts, peel of citrus fruit	3.2	5.3	9.6	11%	16%
'21	Miscellaneous edible preparations	6.6	9.8	7.4	8%	-7%
'22	Beverages, spirits and vinegar	3.8	3.8	3.9	0%	1%
'24	Tobacco and manufactured tobacco	15.3	7.1	3.6	-14%	-15%
'20	Vegetable, fruit, nut	1.6	2.2	3.4	6%	12%
'73	Articles of iron or steel	5.7	4.0	3.2	-7%	-5%
'86	Railway, tramway locomotives, equipment	0.4	0.6	3.1	8%	50%
'34	Soaps, lubricants, waxes, candles	0.9	2.0	3.0	16%	12%
'33	Essential oils, perfumes, cosmetics	2.9	2.1	3.0	-6%	9%
'72	Iron and steel	1.3	4.9	2.9	31%	-12%
'48	Paper and paperboard, pulp, paper	3.6	4.4	2.8	5%	-11%
'39	Plastics and articles thereof	1.7	2.5	2.8	8%	3%
'87	Vehicles other than railway, tramway	0.9	1.6	2.4	13%	11%
'11	Milling products, malt, starches	1.8	2.8	2.1	9%	-7%
'38	Miscellaneous chemical products	2.3	1.5	2.0	-9%	7%

Table 5.11
Export opportunities for SA manufactured products to ECOWAS (%)

Sector	Growth in ECOWAS's demand		SA's market share		RCA 2013	Export opportunities
	2011-2013	2013	2011	2013		
Explosives	13.0	14.4	8.7	6.9	Decreasing	Lost opportunities
Furniture	29.7	53.8	3.0	2.0	Decreasing	Lost opportunities
Soaps, lubricants, waxes, candles, modelling pastes	20.9	48.6	3.3	3.5	Increasing	Rising opportunities
Paper and paperboard, articles of pulp, paper and board	0.9	2.0	4.5	3.9	Decreasing	Lost opportunities
Plastics	8.9	22.1	3.8	4.4	Increasing	Rising opportunities
Milling products, malt, starches, inulin, wheat gluten	17.3	0.3	0.7	0.8	Increasing	Falling opportunities
Photographic or cinematographic goods	18.5	93.9	1.8	6.2	Increasing	Rising opportunities
Tanning, dyeing extracts, tannins, derivs, pigments etc	0.0	3.5	3.8	3.3	Increasing	Lost opportunities
Albuminoids, modified starches, glues, enzymes	-7.3	9.0	1.7	2.9	Increasing	Rising opportunities
Machinery, nuclear reactors, boilers, etc	-0.9	3.6	2.0	2.2	Increasing	Rising opportunities
Headgear and parts thereof	13.5	55.8	2.4	2.8	Decreasing	Rising opportunities
Rubber	-1.5	18.5	0.8	1.5	Decreasing	Rising opportunities
Tools, implements, cutlery, etc of base metal	-6.7	3.2	1.8	1.9	Decreasing	Rising opportunities

Main products imported from ECOWAS

Mineral fuels from ECOWAS represents 98.1 per cent of all South African imports. The remainder of the top 10 imports include cocoa, machinery, pearls amongst others (table 5.12). South Africa's imports from ECOWAS grew on average by 15.7 per cent annually between 2010 and 2013 from US\$ 2.4 billion to US\$ 4.3 billion. Mineral fuels grew annually by 16.4 per cent between 2010 and 2013. Almost all mineral fuels are imported from Nigeria and this is largely comprised of crude oils.

For 2013, Zambia contributed 26 per cent (US\$ 2.7 billion); Zimbabwe 23 per cent (US\$2.4 billion); Swaziland 15 per cent (US\$ 1.5 billion); and DRC 13 per cent (US\$ 1.3 billion). On the other hand, imports grew from US\$ 1.6 billion in 2006 to US\$2.4 billion in 2013. For 2013, South Africa imported the most from Swaziland (US\$1.17 billion or 49 per cent); Zambia (US\$371.5 million or 16 per cent); and Zimbabwe (US\$342.7 million or 14 per cent) (table 5.13).

Table 5.12

South Africa's top imported products from ECOWAS, 2007-2013 (US\$ thousand)

Product code	Product label	2007		2010		2013		Change (%)	
		Value	Share	Value	Share	Value	Share	2007-10	2010-13
TOTAL	All products	1 833 371		2 392 125		4 289 387		6.9%	15.7%
'27	Mineral fuels, oils, distillation products	1 751 917	95.6%	2 294 924	95.9%	4 206 061	98.1%	7.0%	16.4%
'18	Cocoa and cocoa preparations	16 790	0.9%	27 941	1.2%	16 280	0.4%	13.6%	-12.6%
'84	Machinery, nuclear reactors, boilers, etc	5 116	0.3%	2 410	0.1%	12 676	0.3%	-17.2%	51.4%
'71	Pearls, precious stones, metals, coins, etc	3 079	0.2%	5 200	0.2%	10 404	0.2%	14.0%	18.9%
'78	Lead and articles thereof	8 712	0.5%	7 815	0.3%	6 481	0.2%	-2.7%	-4.6%
'67	Bird skin, feathers, artificial flowers, human hair	130	0.0%	2 326	0.1%	5 141	0.1%	105.7%	21.9%
'44	Wood and articles of wood, wood charcoal	8 442	0.5%	6 015	0.3%	5 113	0.1%	-8.1%	-4.0%
'40	Rubber and articles thereof	18 293	1.0%	14 082	0.6%	4 551	0.1%	-6.3%	-24.6%
'23	Residues, wastes of food industry, animal fodder	5 665	0.3%	4 333	0.2%	4 183	0.1%	-6.5%	-0.9%
'88	Aircraft, spacecraft, and parts thereof	922	0.1%	936	0.0%	2 700	0.1%	0.4%	30.3%

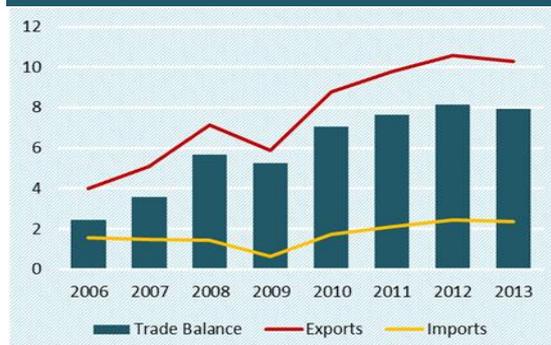
Cocoa was the second most imported product in 2013 despite the fact that a significant decline was witnessed between 2010 and 2013. The top 10 imported products accounted for 99.6 per cent of all imports from ECOWAS in 2013 - this is a clear reflection of highly concentrated nature of trade between South Africa and ECOWAS (and more so with Nigeria because of mineral fuels).

South Africa Trade with COMESA

Trade Trends

South Africa's merchandise exports (imports) to (from) COMESA have been gradually increasing since 2006 with the exception of 2009 and 2013 where both exports and imports declined (figure 5.9). Exports increased from US\$4 billion in 2006 to US\$ 10.3billion in 2013.

Figure 5.9
SA's trade with COMESA, 2006-2013 (US\$ billion)



Exports have been growing at a relatively faster pace compared to imports especially from 2008. This disparity is reflected in the country's trade balance, which has consistently been positive and reached a peak of US\$ 8.16 billion

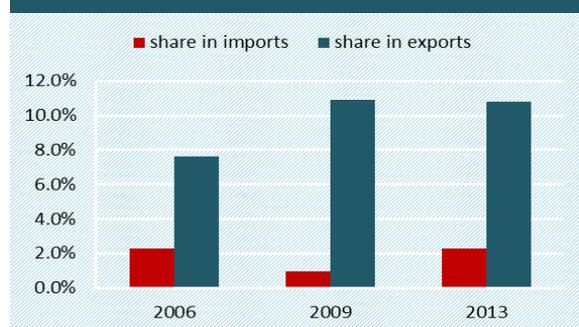
Table 5.13
SA's trade with COMESA by country, 2013
(value in US\$ thousand)

Country	Exports 2013	Share in Exports 2013	Imports 2013	Share in imports 2013
COMESA Total	10 303 537		2 377 788	
Zambia	2 711 156	26.3%	371 453	15.6%
Zimbabwe	2 399 408	23.3%	342 667	14.4%
Swaziland	1 515 987	14.7%	1 165 865	49.0%
Democratic Republic of the Congo	1 364 518	13.2%	12 437	0.5%
Kenya	804 542	7.8%	25 193	1.1%
Malawi	513 459	5.0%	68 325	2.9%
Mauritius	304 731	3.0%	215 251	9.1%
Uganda	181 588	1.8%	5 307	0.2%
Madagascar	169 893	1.6%	105 170	4.4%
Egypt	79 168	0.8%	53 080	2.2%
Ethiopia	79 108	0.8%	9 442	0.4%
Seychelles	45 679	0.4%	782	0.0%
Rwanda	31 434	0.3%	978	0.0%
Djibouti	30 559	0.3%	420	0.0%
Sudan (North + South)	30 209	0.3%	346	0.0%
Libya	21 647	0.2%	62	0.0%
Eritrea	9 101	0.1%	46	0.0%
Comoros	6 230	0.1%	694	0.0%
Burundi	5 120	0.0%	270	0.0%

COMESA market share

The relationship between the value of South Africa's exports to COMESA and their relative share of South African global exports has been steadily increasing from 7.6 per cent in 2006 to 10.8 per cent in 2013. On the other hand, the share of COMESA imports relative to South Africa's global imports has been fluctuating from 2.3 per cent in 2006 to 1 per cent in 2009 before increasing to 2.3 per cent in 2013 (figure 5.10).

Figure 5.10
COMESA's share in SA trade, 2003-2013



Main products exported to COMESA by SA

South Africa's exports to COMESA grew on average by 14.7 per cent per annum (compound annual growth) between 2007 and 2010 from US\$5.1 billion to US\$ 8.8 billion.

The pace of exports growth slowed down between 2010 and 2013, achieving compound annual growth of 4 per cent (table 5.14).

Amongst the top 10 export products to COMESA, only 2 are primary/resource based commodities namely iron and steel and articles of iron or steel. The remainder of the exports are manufactured products which show that South Africa's trade with COMESA is concentrated in manufactured goods. The top 10 products accounted for 70.6 per cent of all exports to COMESA in 2007 and this fell to 63.6 per cent in 2013.

Machinery, vehicles, mineral fuels, electronic equipment and iron and steel are the major export products. Between 2007 and 2013, the share of machinery declined from 15.7 per cent or US\$796 million to 15.3 per cent or US\$ 1.58 billion. The countries driving exports of machinery are Zambia (US\$ 564 million or 36 per cent); DRC (US\$369 million or 23 per cent); and Zimbabwe (US\$ 318 million or 20 per cent). In terms of vehicles, countries driving exports are Zambia, Zimbabwe, Swaziland and DRC.

Revealed Comparative Advantage

After identifying the top export industries and products, we now evaluate for which of the products South Africa has comparative advantage with respect to COMESA. Based on 2013, South Africa has comparative advantage in 41 products and table 5.15 just indicates products where the country has the greatest RCA. The greatest comparative advantage is witnessed in explosives, furniture, milling products, fertilisers and soaps.

Amongst the top 10 export products by value, South Africa has comparative advantage in 8 of the products with the exception of electronic equipment and mineral fuels. This indicates some degree of alignment between top export products and their relative comparative advantage.

South Africa has managed to gain comparative advantage in 9 products between 2006 and 2013 and these include; wool (from 0.8 to 1.7), dairy products (0.7 to 1.4), coffee (0.9 to 1.4)

and vehicles (0.9 to 1.2). In addition, South Africa managed to improve its comparative advantage in at least 17 products between 2006 and 2013. Some of the products include soaps (3.7 to 6.5), milling products (5.2 to 8.4), miscellaneous edible preparations (2.8 to 3.7) and machinery (1.0 to 1.4).

South Africa is losing ground (though it still has comparative advantage) in 14 products between 2006 and 2013. These products include; explosives, furniture, fertilisers, sugars, iron and steel, cereals, miscellaneous chemical products and inorganic chemicals. More worrying are product categories where South Africa has lost its comparative

advantage between 2006 and 2013 – these products include resins, umbrellas, laminated textile fabric, zinc and railway.

Identification of trade opportunities in manufactured products

Similar to SADC, South Africa lost export opportunities to COMESA in three products, salt, sulphur, etc., printed books and machinery (table 5.16). The country did not manage to capture a portion of the increasing COMESA's demand in these products in 2013. Yet there was an opportunity to expand exports further.

Table 5.14
South Africa's top export products to COMESA, 2007- 2013 (values in US\$ thousand)

Product code	Product label	2007		2010		2013		Change (%)	
		Value	Share	Value	Share	Value	Share	2007-10	2010-13
TOTAL	All products	5 079 257		8 795 023		10 303 537		14.7%	4.0%
'84	Machinery, nuclear reactors, boilers	796 216	15.7%	1 166 071	13.3%	1 581 560	15.3%	10.0%	7.9%
'87	Vehicles other than railway, tramway	508 437	10.0%	659 757	7.5%	890 985	8.6%	6.7%	7.8%
'27	Mineral fuels, oils, distillation products	526 949	10.4%	818 414	9.3%	862 669	8.4%	11.6%	1.3%
'85	Electrical, electronic equipment	323 724	6.4%	516 345	5.9%	708 996	6.9%	12.4%	8.2%
'72	Iron and steel	486 324	9.6%	670 928	7.6%	614 744	6.0%	8.4%	-2.2%
'73	Articles of iron or steel	299 026	5.9%	480 808	5.5%	588 253	5.7%	12.6%	5.2%
'39	Plastics and articles thereof	221 578	4.4%	408 388	4.6%	506 320	4.9%	16.5%	5.5%
'31	Fertilizers	153 762	3.0%	191 943	2.2%	317 350	3.1%	5.7%	13.4%
'38	Miscellaneous chemical products	137 728	2.7%	188 445	2.1%	244 396	2.4%	8.2%	6.7%
'48	Paper and paperboard, pulp, paper	131 693	2.6%	290 833	3.3%	240 767	2.3%	21.9%	-4.6%

Table 5.15
Revealed Comparative Advantage Indices for SA exports to COMESA, 2006- 2013

Product code	Product label	RCA			% change	
		2006	2010	2013	2006-10	2010-13
'36	Explosives, pyrotechnics	39.3	26.8	26.9	-7%	0%
'94	Furniture, lighting, prefab buildings	14.6	15.5	14.5	1%	-2%
'11	Milling products, malt, starches	5.2	9.6	8.4	13%	-3%
'31	Fertilizers	13.4	6.0	8.3	-15%	8%
'34	Soaps, lubricants, waxes, candles	3.7	6.0	6.5	10%	2%
'25	Salt, sulphur, earth, lime and cement	2.6	4.1	5.8	10%	9%
'17	Sugars and sugar confectionery	6.2	5.1	5.2	-4%	1%
'21	Miscellaneous edible preparations	2.8	4.0	3.7	8%	-2%
'73	Articles of iron or steel	2.4	3.3	3.3	7%	0%
'15	Animal, vegetable fats and oils	1.6	3.4	2.9	17%	-4%
'72	Iron and steel	3.0	3.0	2.7	0%	-2%
'33	Essential oils, perfumes, cosmetics	2.1	2.3	2.6	1%	3%
'48	Paper and paperboard, pulp, paper	2.4	2.9	2.5	4%	-4%
'10	Cereals	6.9	3.5	2.4	-13%	-8%
'19	Cereal, flour, starch	1.1	2.9	2.4	20%	-4%

Table 5.16
Export Opportunities for SA's manufactured products to COMESA (%)

Sector	Growth in COMESA's demand		SA's market share		RCA 2013	Export opportunities
	2011-2013	2013	2011	2013		
Explosives	30.0	32.8	44.4	35.3	Decreasing	Limited opportunities
Furniture	22.0	10.6	13.2	6.1	Decreasing	Limited opportunities
Fertilizers	56.1	15.5	4.7	11.4	Decreasing	Falling opportunities
Soaps, lubricants, waxes, candles, modelling pastes	24.5	6.3	21.0	18.4	Increasing	Limited opportunities
Salt, sulphur etc.	8.2	13.3	12.7	8.4	Increasing	Lost opportunities
Paper and paperboard, articles of pulp, paper and board	12.0	2.5	10.8	8.6	Increasing	Limited opportunities
Cereal, flour, starch, milk preparations and products	24.5	9.2	11.5	8.7	Increasing	Limited opportunities
Miscellaneous chemicals	11.6	6.2	12.0	11.6	Decreasing	Limited opportunities
Beverages, spirits and vinegar	33.0	12.9	29.2	18.8	Increasing	Limited opportunities
Rubber	27.3	5.6	10.2	7.8	Decreasing	Limited opportunities
Ceramic	34.9	20.5	8.7	4.0	Increasing	Limited opportunities
Printed books	3.7	8.6	10.7	7.0	Decreasing	Lost opportunities
Tools, implements, cutlery, etc of base metal	18.0	12.8	13.4	9.5	Increasing	Limited opportunities
Tanning, dyeing extracts, tannins, dyes, pigments etc	16.7	3.4	10.0	7.4	Decreasing	Limited opportunities
Plastics	23.7	15.0	7.6	7.0	Increasing	Limited opportunities
Albuminoids, modified starches, glues, enzymes	22.0	10.1	8.7	9.3	Increasing	Falling opportunities
Dairy products, eggs, honey, edible animal products	21.2	2.6	4.7	4.2	Increasing	Limited opportunities
Inorganic chemicals	34.0	31.3	13.1	5.9	Decreasing	Limited opportunities
Residues, wastes of food industry, animal fodder	56.0	15.3	5.3	4.6	Increasing	Limited opportunities
Machinery, nuclear reactors, boilers, etc	8.4	13.4	9.7	8.5	Increasing	Lost opportunities
Headgear and parts thereof	12.1	9.6	11.8	12.5	Increasing	Falling opportunities
Vehicles	11.4	3.7	7.8	6.9	Increasing	Limited opportunities
Glass and glassware	15.7	7.3	8.6	5.8	Increasing	Limited opportunities

However, while the market share for fertilizers, albuminoids and headgear have increased, the demand for the products by COMESA has declined (reflecting falling opportunities in these products), but given the rapid economic growth projection and A potential Tripartite FTA, South Africa could see more than average growth in the COMESA's demand for these products in the near future. Moreover, the country witnessed a large number of limited export opportunities to COMESA.

Main products imported from COMESA

The top imported products from COMESA are essential oils, sugar, copper and miscellaneous chemical products (table 5.17). South Africa's

imports from COMESA grew on average by 8 per cent annually between 2010 and 2013 from US\$ 1.75 billion to US\$2.4 billion. Essential oils grew annually by 301.5 per cent (29.1 percent) between 2007 and 2010 (2010 to 2013). Almost all (99.6 per cent to be precise) essential oils are imported from Swaziland and this is largely comprised of odoriferous mixtures which are used as raw materials in the cosmetic and toiletries industries. Sugars were the second most imported product in 2013 and this is contrast to 2010 where it was ranked first. Swaziland accounts for almost 98 per cent of all sugars imported by South Africa from COMESA. Overall, the top 10 imported products accounted for 50.6 per cent of all imports from COMESA in 2010 and this increased to 72.8 per cent in 2013 - this is a clear reflection imports getting concentrated in a few products.

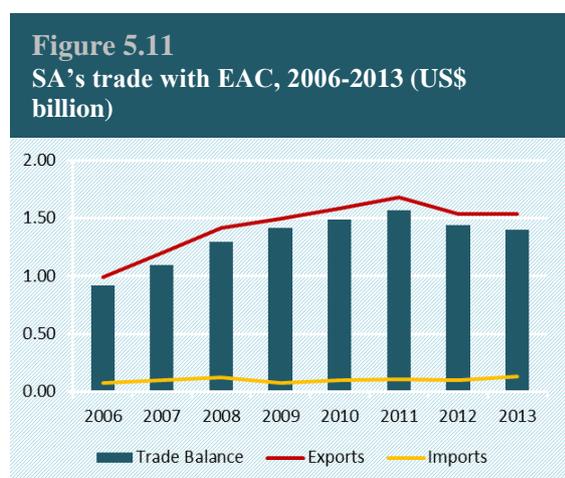
Table 5.17
South Africa's top imported products from COMESA, 2007- 2013 (value in US\$ thousand)

Product code	Product label	2007		2010		2013		Change (%)	
		Value	Share	Value	Share	Value	Share	2007-10	2010-13
TOTAL	All products	1 496 871		1 747 157		2 377 788		3.9%	8.0%
'33	Essential oils, perfumes, cosmetics, toiletries	494	0.0%	128 406	7.3%	356 166	15.0%	301.5%	29.1%
'17	Sugars and sugar confectionery	12 697	0.8%	223 830	12.8%	223 916	9.4%	104.9%	0.0%
'74	Copper and articles thereof	139 327	9.3%	172 302	9.9%	207 066	8.7%	5.5%	4.7%
'38	Miscellaneous chemical products	902	0.1%	53 926	3.1%	200 127	8.4%	178.1%	38.8%
'61	Articles of apparel, accessories, knit or crochet	28 688	1.9%	71 463	4.1%	175 785	7.4%	25.6%	25.2%
'62	Articles of apparel, accessories, not knit or crochet	39 521	2.6%	79 203	4.5%	167 654	7.1%	19.0%	20.6%
'26	Ores, slag and ash	330 264	22.1%	7 498	0.4%	152 029	6.4%	-61.2%	112.2%
'52	Cotton	62 919	4.2%	71 074	4.1%	96 874	4.1%	3.1%	8.0%
'27	Mineral fuels, oils, distillation products, etc	76 969	5.1%	25 963	1.5%	78 930	3.3%	-23.8%	32.0%
'44	Wood and articles of wood, wood charcoal	25 912	1.7%	51 041	2.9%	73 439	3.1%	18.5%	9.5%

South Africa Trade with EAC

Trade Trends

South Africa's merchandise exports to EAC have been gradually increasing since 2006 with the exception of 2012 and 2013 where marginal declines were experienced. Merchandise imports have however stabilised over the period, the only decline was witnessed in 2009 and 2012 (figure 5.11). The trade balance between 2006 and 2013 was positive with a peak of US\$1.57 billion in 2011.



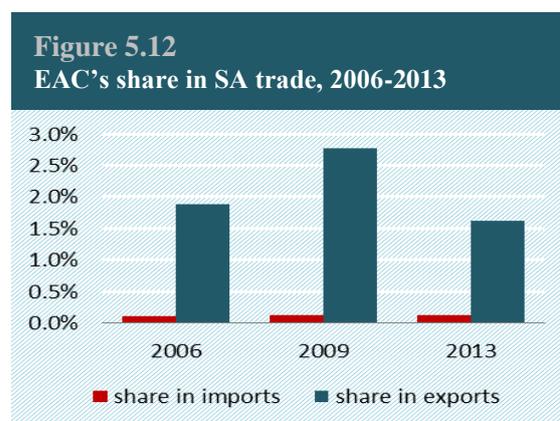
Exports increased from US\$991 million in 2006 to US\$1.54 billion in 2013. For 2013, the greatest recipient of SA exports was Kenya which contributed 54.3 per cent (US\$ 804 million) of all exports to EAC. On the other hand, imports grew from US\$ 76.2 million in 2006 to US\$134.5 million in 2013. For 2013, South Africa imported the most from Kenya (US\$102.7 million or 76.4 per cent). South Africa has imported the least among the EAC members from Burundi accounting for only 0.2 per cent in 2013 (table 5.18).

Table 5.18
SA's trade with EAC by country, 2013 (US\$ thousand)

Country	Exported 2013	Share of Exports 2013	Imports 2013	Share of imports 2013
EAC Total	1 535 210		134 480	
Kenya	804 542	52.4%	102 732	76.4%
Tanzania	512 526	33.4%	25 193	18.7%
Uganda	181 588	11.8%	5 307	3.9%
Rwanda	31 434	2.0%	978	0.7%
Burundi	5 120	0.3%	270	0.2%

ECA market share

The relationship between the value of South Africa's exports to EAC and their relative share of South African global exports has been fluctuating from 1.9 per cent in 2006 to 1.6 per cent in 2013. This indicates that EAC is still a smaller trading bloc in Africa compared to SADC, COMESA and ECOWAS. On the other hand, the share of ECA imports relative to South Africa's global imports has been consistently less than 1 per cent between 2006 and 2013 (figure 5.12).



Main products exported to EAC by SA

South Africa's exports to EAC grew on average by 7.2 per cent per annum (compound annual growth) between 2007 and 2010 from US\$1.2 billion to US\$ 1.58 billion. Exports declined by 0.8 per cent on average annually between 2010 and 2013 (table 5.19).

Amongst the top 10 export products to EAC, only 2 are primary/resource based commodities namely iron and steel and articles of iron or steel. The remainder of the exports are manufactured products which show that South Africa's top exports with EAC are concentrated in manufactured goods. The top 10 products accounted for 66.1 per cent of all exports to EAC in 2007 and this increased to 72.7 per cent in 2013.

Iron and steel, machinery, vehicles, electronic equipment and mineral fuels are the major export products. Between 2007 and 2013, the share of iron and steel declined marginally from 21.5 per cent or US\$258.4 million to 20.9 per cent or US\$320.8 million. The

countries driving exports of iron and steel to EAC are Kenya (US\$ 221.7 million or 69 per cent); Tanzania (US\$71.1 million or 22 per cent); and Uganda (US\$ 26.6 million or 8 per cent). In terms of machinery, vehicles and electrical equipment, Kenya, Tanzania and Uganda remain as the countries driving South Africa's exports.

Revealed Comparative Advantage

Again after identifying the top export industries and products we now evaluate for which of the products South Africa has comparative advantage with respect to EAC. Based on 2013, South Africa has comparative advantage in 31 products and table 5.20 just indicates products where the country has the greatest RCA. The greatest comparative advantage is witnessed in explosives, furniture, iron and steel, sugars, beverages and miscellaneous chemicals. Amongst the top 10 export products by value, South Africa has comparative advantage in 8 of the products with the exception of electronic equipment and mineral fuels. This indicates that there is some degree of alignment between top export products and their relative comparative advantage. South Africa has managed to gain comparative advantage in 10 products between 2006 and 2013 and these include; edible fruit (from 0.9 to 2.2), machinery (0.7 to 1.0), vehicles (0.8 to 1.3) and albuminoids (0.9 to 1.9).

South Africa is losing ground (though it still has comparative advantage) in 14 products between 2006 and 2013. These products include; furniture, sugars, miscellaneous edible preparations, essential oils, articles of iron or steel, plastics and tools.

More worrying are product categories where South Africa has lost its comparative advantage between 2006 and 2013 – these products include other made textiles, oil seed, umbrellas, fertilisers, zinc and lead.

Identification of trade opportunities in manufactured products

South Africa witnessed rising export opportunities in three manufactured products: miscellaneous chemicals, inorganic chemicals and cocoa (table 5.21). ECA's demand for these products grew faster than the average and South Africa managed to capture a portion of the increasing demand. This provides an opportunity to expand exports further.

Evidence also shows that South Africa lost export opportunities to ECA in tanning, dyeing etc., vehicles, printed books and plastics (although it is losing competitiveness in the last two products). The country did not manage to capture a portion of the increasing ECA's demand in these products in 2013. Yet there was an opportunity to expand exports further.

However, while the market share for explosives have increased, the demand for the products by ECA has declined (reflecting falling opportunities in this product), but given its rapid economic growth projection and a potential Tripartite FTA, South Africa could see more than average growth in the ECA's demand for this product in the near future. Moreover, the country witnessed limited export opportunities to ECA in furniture, beverages (mainly wine), albuminoids and tools.

Table 5.19
South Africa's top exported products to EAC, 2007-2013 (values in US\$ thousand)

Product code	Product label	2007		2010		2013		Change (%)	
		Value	Share	Value	Share	Value	Share	2007-10	2010-13
TOTAL	All products	1 200 737		1 584 240		1 535 210		7.2%	-0.8%
'72	Iron and steel	258 385	21.5%	425 943	26.9%	320 816	20.9%	13.3%	-6.8%
'84	Machinery, nuclear reactors, boilers	100 666	8.4%	141 531	8.9%	175 245	11.4%	8.9%	5.5%
'87	Vehicles other than railway, tramway	66 448	5.5%	101 433	6.4%	152 421	9.9%	11.2%	10.7%
'85	Electrical, electronic equipment	80 612	6.7%	72 490	4.6%	112 693	7.3%	-2.6%	11.7%
'27	Mineral fuels, oils, distillation products	57 463	4.8%	71 769	4.5%	92 080	6.0%	5.7%	6.4%
'38	Miscellaneous chemical products	46 701	3.9%	44 040	2.8%	66 489	4.3%	-1.5%	10.8%
'48	Paper and paperboard, pulp, paper	53 948	4.5%	89 903	5.7%	55 004	3.6%	13.6%	-11.6%
'73	Articles of iron or steel	55 696	4.6%	54 831	3.5%	50 019	3.3%	-0.4%	-2.3%
'39	Plastics and articles thereof	50 168	4.2%	86 716	5.5%	47 477	3.1%	14.7%	-14.0%
'22	Beverages, spirits and vinegar	23 686	2.0%	33 388	2.1%	43 882	2.9%	9.0%	7.1%

Table 5.20
Revealed Comparative Indices for SA exports to EAC, 2006-2013

Product code	Product label	RCA			% change	
		2006	2010	2013	2006-10	2010-13
'36	Explosives, pyrotechnics	15.1	9.7	15.4	-9%	12%
'94	Furniture, lighting, prefab buildings	17.5	15.5	10.8	-2%	-9%
'72	Iron and steel	7.7	10.5	9.6	6%	-2%
'17	Sugars and sugar confectionery	9.7	9.5	6.1	-1%	-10%
'22	Beverages, spirits and vinegar	2.8	3.7	4.6	5%	6%
'38	Miscellaneous chemical products	4.4	2.7	4.3	-9%	12%
'48	Paper and paperboard, pulp, paper	3.5	5.0	3.8	7%	-7%
'21	Miscellaneous edible preparations	3.2	3.4	2.8	2%	-5%
'33	Essential oils, perfumes, cosmetics	3.0	2.5	2.7	-4%	3%
'08	Edible fruit, nuts, peel of citrus fruit	0.9	1.3	2.2	6%	15%
'86	Railway, tramway locomotives, equipment	1.4	1.0	2.2	-6%	21%
'32	Tanning, dyeing extracts, pigments	2.1	2.1	2.0	0%	-1%
'73	Articles of iron or steel	2.6	2.1	1.9	-4%	-3%
'35	Albuminoids, modified starches, glues	0.9	1.3	1.9	7%	10%
'76	Aluminium and articles thereof	2.4	1.5	1.8	-9%	5%
'34	Soaps, lubricants, waxes, candles	1.6	1.9	1.5	3%	-5%
'40	Rubber and articles thereof	1.7	1.3	1.5	-6%	4%
'49	Printed books, newspapers, pictures	4.0	1.4	1.4	-19%	0%
'83	Miscellaneous articles of base metal	1.7	1.4	1.3	-4%	-1%
'87	Vehicles other than railway, tramway	0.8	0.9	1.3	3%	11%
'55	Manmade staple fibres	0.4	0.5	1.3	7%	26%
'28	Inorganic chemicals	1.0	0.7	1.3	-6%	17%
'44	Wood and articles of wood, charcoal	0.8	1.0	1.2	4%	6%

Table 5.21
Export opportunities for SA manufactured products to EAC (%)

Sector	Growth in EAC's demand		SA's market share		RCA 2013	Eport opportunities
	2011-2013	2013	2011	2013		
Explosives	9.0	6.6	15.6	19.0	Increasing	Falling opportunities
Furniture	16.9	2.1	4.9	3.6	Decreasing	Limited opportunities
Beverages, spirits and vinegar	9.3	1.2	19.7	19.2	Increasing	Limited opportunities
Miscellaneous chemicals	5.1	10.3	11.8	13.8	Decreasing	Rising opportunities
Tanning, dyeing extracts, tannins, derivs, pigments etc	8.1	10.8	13.3	8.9	Decreasing	Lost opportunities
Albuminoids, modified starches, glues, enzymes	12.0	11.6	16.1	12.5	Increasing	Limited opportunities
Printed books	-8.5	16.0	8.5	3.7	Decreasing	Lost opportunities
Vehicles	6.8	10.6	5.5	4.5	Increasing	Lost opportunities
Inorganic chemicals	3.5	7.6	3.8	5.1	Increasing	Rising opportunities
Cocoa	0.5	19.8	11.6	20.6	Increasing	Rising opportunities
Tools, implements, cutlery, etc of base metal	17.8	6.4	8.9	3.4	Decreasing	Limited opportunities
Plastics	12.7	21.4	4.8	3.1	Decreasing	Lost opportunities

Table 5.22
South Africa's top imported products from EAC, 2007-2013 (values in US\$ thousand)

Product code	Product label	2007		2010		2013		Change (%)	
		Value	Share	Value	Share	Value	Share	2007-10	2010-13
TOTAL	All products	102 340		98 156		134 480		-1.0%	8.2%
'27	Mineral fuels, oils, distillation products, etc	7 378	7.2%	41 520	42.3%	72 824	54.2%	54.0%	15.1%
'09	Coffee, tea, mate and spices	6 196	6.1%	12 439	12.7%	13 355	9.9%	19.0%	1.8%
'07	Edible vegetables and certain roots and tubers	1 299	1.3%	1 810	1.8%	9 222	6.9%	8.6%	50.2%
'84	Machinery, nuclear reactors, boilers, etc	4 499	4.4%	5 828	5.9%	6 748	5.0%	6.7%	3.7%
'23	fodder	628	0.6%	2 089	2.1%	4 468	3.3%	35.1%	20.9%
'61	Articles of apparel, accessories, knit or crochet	484	0.5%	2 329	2.4%	3 700	2.8%	48.1%	12.3%
'06	Live trees, plants, bulbs, roots, cut flowers etc	1 142	1.1%	2 721	2.8%	3 332	2.5%	24.2%	5.2%
'24	substitutes	11 242	11.0%	7 913	8.1%	1 965	1.5%	-8.4%	-29.4%
'88	Aircraft, spacecraft, and parts thereof	5 531	5.4%	598	0.6%	1 763	1.3%	-42.7%	31.0%
'52	Cotton	1 605	1.6%	322	0.3%	1 393	1.0%	-33.1%	44.2%

Main products imported from ECA

The top imported products from ECA are mineral fuels, coffee (including tea, mate and spices), edible vegetables, residues (waste of food industry) and machinery (table 5.22).

South Africa's imports from ECA experienced negative average growth of 1 per cent annually between 2007 and 2010. However, imports recovered and grew on average by 8 per cent annually between 2010 and 2013 from US\$ 98.2 million to US\$134.5 million. Mineral fuels grew annually by 54 per cent (15.1 per cent) between 2007 and 2010 (2010 to 2013). All mineral fuels are imported from Tanzania and this is largely comprised of petroleum oils. Coffee (tea, mate and spices) were the second most imported product in 2013 and Tanzania accounts for 65 per cent and Kenya 21 per cent of the coffee imports. Overall, the top 10 imported products accounted for 79 per cent of all imports from EAC in 2010 and this increased to 88.3 per cent in 2013.

Potential Risks with Africa's trade

Whilst the GDP outlook for rest of Africa looks positive as discussed above, there are significant risks that South Africa should be aware of from a trade perspective. Tariff levels remain a concern though most African countries are part of the WTO. A closer look at the tariff levels for South Africa's major exports reveals that tariffs have been considerably higher for manufactured products as compared to resource based products (see table 5.23).

Moreover, although South Africa's trade with the rest of Africa is expanding, the export basket destined to these African countries is still fairly concentrated with the top 10 products accounting for 60.2 per cent. In addition, five countries (Botswana, Namibia, Mozambique, Zambia and Zimbabwe) accounted for 61.2 per cent of all exports to Africa – any form of unrest or economic downturn in any country of these countries will have an impact of South Africa's trade.

Table 5.23
Equivalent ad valorem tariff (%) applied to South Africa's top exports, by country, 2013

Product code	Product label	Botswana	Namibia	Mozambique	Zimbabwe
'27	Mineral fuels, oils, distillation products	0.78	0.78	4.09	9.28
'84	Machinery, nuclear reactors, boilers	2.73	2.73	6.11	9.65
'87	Vehicles other than railway, tramway	13.85	13.85	7.81	20.17
'85	Electrical, electronic equipment	2.73	2.73	6.11	9.65
'73	Articles of iron or steel	4.13	4.13	6.52	15.02
'72	Iron and steel	4.13	4.13	6.52	15.02
'39	Plastics and articles thereof	8.31	8.31	7.82	22.92
'48	Paper and paperboard, pulp, paper	3.69	3.69	5.48	10.22
'22	Beverages, spirits and vinegar	25.27	25.64	12.69	37.37
'71	Pearls, precious stones, metals, coins	1.2	1.2	15.22	7.89
'40	Rubber and articles thereof	8.31	8.31	7.82	22.92
'34	Soaps, lubricants, waxes, candles	2.42	2.42	4.16	8.04
'10	Cereals	25.27	25.64	12.69	37.37
'38	Miscellaneous chemical products	2.42	2.42	4.16	8.04
'17	Sugars and sugar confectionery	25.27	25.64	12.69	37.37
'33	Essential oils, perfumes, cosmetics	2.42	2.42	4.16	8.04
'31	Fertilizers	13.28	13.28	16.68	25.81

Table 5.24
South Africa versus China and India's exports to Africa in 2013 (US\$ thousand)

Product code	Product label	South Africa's exports to Africa			India's exports to Africa			China's exports to Africa		
		Value in 2010	Value in 2013	CAGR 2010-13	Value in 2010	Value in 2013	CAGR 2010-13	Value in 2010	Value in 2013	CAGR 2010-13
TOTAL	All products	12 324 685	27 399 740	22.1%	17 887 335	34 076 067	17.5%	59 815 448	92 584 454	11.5%
'27	Mineral fuels, oils, distillation products	1 139 674	3 494 448	32.3%	4 109 213	9 842 701	24.4%	517 895	774 274	10.6%
'84	Machinery, nuclear reactors, boilers	1 695 567	3 266 113	17.8%	1 162 791	1 774 256	11.1%	7 874 085	11 634 115	10.3%
'87	Vehicles other than railway, tramway	1 106 698	3 071 793	29.1%	1 870 618	3 518 188	17.1%	4 150 118	6 749 572	12.9%
'85	Electrical, electronic equipment	724 448	1 629 018	22.5%	1 025 086	1 475 651	9.5%	9 307 683	12 225 832	7.1%
'73	Articles of iron or steel	809 828	1 262 033	11.7%	539 310	747 726	8.5%	3 234 692	4 672 196	9.6%
'72	Iron and steel	1 051 508	1 131 303	1.8%	714 999	1 197 806	13.8%	1 049 342	2 368 347	22.6%
'39	Plastics and articles thereof	598 863	1 061 753	15.4%	532 364	964 832	16.0%	1 550 739	3 395 726	21.6%
'48	Paper and paperboard, articles of pulp, paper	400 278	563 783	8.9%	197 959	265 078	7.6%	442 784	858 746	18.0%
'22	Beverages, spirits and vinegar	250 536	514 728	19.7%	55 934	201 894	37.8%	9 113	12 494	8.2%
'71	Pearls, precious stones, metals, coins	3 683	495 623	240.6%	73 530	122 779	13.7%	73 255	57 239	-6.0%
'40	Rubber and articles thereof	199 248	471 940	24.1%	231 879	399 761	14.6%	1 400 398	2 464 937	15.2%
'34	Soaps, lubricants, waxes, candles	209 549	465 846	22.1%	43 892	79 411	16.0%	218 418	378 226	14.7%
'10	Cereals	144 286	454 745	33.2%	90 185	2 385 374	126.8%	64 164	1 982	-58.1%
'38	Miscellaneous chemical products	238 772	448 033	17.0%	181 516	305 870	13.9%	509 107	934 223	16.4%
'17	Sugars and sugar confectionery	224 864	439 715	18.3%	119 229	488 501	42.3%	78 300	137 912	15.2%
'33	Essential oils, perfumes, cosmetics	184 277	436 957	24.1%	88 198	146 036	13.4%	62 110	124 091	18.9%
'31	Fertilizers	176 127	431 523	25.1%	10 670	11 509	1.9%	76 566	216 942	29.7%
'21	Miscellaneous edible preparations	188 497	370 291	18.4%	45 080	54 490	4.9%	177 383	289 611	13.0%

The influence of China and India (to some extent) in the African export market also possess a potential challenge to South Africa's exports. Having a closer look at the 2013 top 10 South Africa's exports to the rest of the continent reveals that China has exported more to Africa compared to South Africa in 6 products namely; machinery, vehicles, electrical equipment, articles of iron or steel, iron and steel and plastics (table 5.24). India on the other hand has exported more mineral fuels to Africa compared to South Africa and China. As such, South Africa is facing competition in Africa because it exports mostly manufactured products in Africa which the Chinese and Indians also have comparative advantage. However, in terms of export growth, South Africa is still leading with a compound annual growth rate of 22.1 per cent (from US\$ 12.3 billion to US\$ 17.4 billion) between 2010 and 2013 for all products compared to China (11.5 per cent, from US\$ 59.8 billion to US\$ 92.4 billion) and India (17.5 per cent, from US\$ 17.9 billion to US\$ 34.1 billion).

Having said that, it should be however noted that in terms of export value, the EU28 currently export more to Africa, rising from US\$ 165 billion to US\$ 205 billion between 2010 and 2013. This translates into average annual growth (CAGR) of 5.6 per cent which is much lower compared to South Africa, China and India. With regards to the USA, exports to Africa have increased from US\$ 28.3 billion in 2010 to US\$ 35 billion in 2013 translating into an average annual growth of 5.5 per cent.

Conclusion

In sum, the level of transformation from resource based exports to manufactured exports in Africa has been encouraging. The manufactured products that South Africa needs to prioritise to increase the pace of transformation are diverse which provides an excellent platform to accelerate structural change. South Africa in the last decade has also managed to gain comparative advantage in high tech industries such as machinery, vehicles and railway.

To maximise opportunities inherent in Africa, South Africa needs to boost exports in those products that are in demand and in which it has gained more comparative advantage. Such product includes salt, sulphur, etc., cereal, flour, starch etc., coffee (for SADC); soaps, plastics, photographic or cinematographic goods, tanning, albuminoids, machinery and milling products (ECOWAS); salt, sulphur etc., albuminoids, machinery and headgear and parts (COMESA) and explosives, vehicles, inorganic chemicals, cocoa (EAC).

In addition, the country can also raise its competitiveness, particularly in those manufactured products which are in demand but in which it is losing or has lost comparative advantage, such as inorganic chemicals, printed books, cereals, fertilizers, and sugars and sugar confectionary (with respect to SADC); rubber, headgear and parts, tools, paper and paperboard, furniture and explosives (ECOWAS); fertilizers, printed books (COMESA), and miscellaneous chemicals, tanning, dyeing etc., printed books, plastics, fertilizers and aircraft, spacecraft etc. (EAC).

Finally, the potential tripartite FTA between SADC, COMESA and ECA should provide further market access for South Africa's manufactured goods.

Chapter 6

Trade outlook

In the previous three chapters we looked at the top ten products that are exported and imported by South Africa from different major trading partners. We also looked at whether South Africa has revealed comparative advantage in exporting these top ten products to the respective destination countries and also went on to identify whether these top ten products are manufactures which can be used to promote structural change.

In this chapter we will use the growth and trade forecast provided by the World Economic Outlook to discuss the general trade outlook taking into account the growth trajectory of the world economy and the different trading partners which we discussed in chapters 3 to 5. This will give an indication of South Africa's future trade prospects and to some extent what South Africa might require to change the structure of its trade. Lastly this chapter will discuss the strategies that South Africa can possibly take to position itself in light of the growth and trade forecast in the world economy.

Global Outlook

In order to have meaningful trade outlook, the starting point is to look at the global outlook. The performance of the world economy and South Africa's trading partners has a direct effect on trade performance. As discussed in chapters 3 to 5, the global recession in 2009 affected trade. The world economy is generally forecast to grow on average at 4 per cent per year until 2018. South Africa's major trading partners are expected to contribute positively to this world growth.

Table 6.1 shows that countries in this study contribute about 76 per cent to the world economy and the largest contributor is the EU region whilst USA is the largest contributor at a country level. The African continent with a population twice the size of Europe as well as two times the number of countries contributes twelve times less than Europe into the world economy. If this pattern of contribution by

member countries in table 6.1 does not change, then the growth in the world economy will continue being driven by the USA, China and the European Union. Thus in 2015 for example the world economy will grow by 3.96 per cent and EU will contribute 0.93 to this growth whilst USA will contribute 0.9 with China adding 0.48. India and Africa combined will contribute less than Japan.

Table 6.1
Forecast GDP Growth Rate

	2014	2015	2016	2017	2018	Average contribution to world GDP
World	3.59	3.964	4.067	4.114	4.123	
Drivers of the above growth rate						
Brazil	0.107	0.118	0.121	0.123	0.123	2.982
Russia	0.104	0.114	0.117	0.119	0.119	2.883
India	0.086	0.095	0.097	0.098	0.099	2.394
China	0.437	0.482	0.495	0.501	0.502	12.170
USA	0.817	0.903	0.926	0.937	0.939	22.768
Japan	0.245	0.270	0.277	0.280	0.281	6.817
EU	0.844	0.932	0.956	0.967	0.969	23.507
Africa	0.064	0.071	0.073	0.074	0.074	1.791
South Africa	0.017	0.019	0.020	0.020	0.020	0.482
Other	0.869	0.960	0.985	0.996	0.998	24.207

Source: World Economic Outlook, October 2014

As indicated in the earlier chapters, Africa, China and India account for about 45 per cent of South Africa's exports and the forecasted growth will potentially translate into high demand for South Africa products. The other interesting thing is that if the projected economic growth rate for Africa is realised and given that the region accounts for about 29 per cent of South Africa's global exports, this would result in increasing demand for exports and subsequently deepen intra-regional trade. It has long been argued that Africa trades very little not only with the rest of the world but even with itself, so the increase in the demand for South Africa products by the rest of Africa would be a step in the right direction in terms of promoting intra-African trade. On the other hand, South Africa enjoys a favourable trade balance with Japan, but the sluggish growth forecast might not translate into significant export revenues for South Africa.

Given the economic growth rate forecasts on these major trading partners, the table below looks at how this growth rate will potentially affect the demand for exports from these countries. Table 6.2 shows that the demand for exports from countries such as India, China and Africa is projected to increase and the highest increase in the demand for exports between the periods 2015 to 2018 will be recorded in India.

Table 6.2
Forecast Growth Rate for imports

	2014	2015	2016	2017	2018	Average 2015-2018
World	4.75	5.43	5.59	5.81	5.90	5.68
European Union	n/a	n/a	n/a	n/a	n/a	0.00
Sub-Saharan Africa	6.61	5.82	5.56	5.96	6.19	5.88
Brazil	0.46	5.23	5.34	4.87	5.20	5.16
China	6.80	6.40	6.00	6.00	6.00	6.10
India	5.48	8.21	9.00	9.14	10.01	9.09
Japan	3.84	4.60	5.71	5.77	5.92	5.50
Russia	5.61	5.53	4.42	6.05	4.83	5.21
United States	3.46	4.54	4.65	4.69	4.41	4.57
South Africa	4.20	4.30	4.50	4.50	4.90	4.55

Source: World Economic Outlook, October 2014

The demand for imports by China is expected to remain stable at 6 per cent from 2016 onwards whilst other economies will see upward growths suggesting that the high level of growth rates projected for these countries may indeed translate into high demand for exports and South Africa may also benefit from this. However what will actually happen to the demand for South African products by these countries may depend on income elasticity of demand for the country's products. In the case of China, the change in South Africa's exports to China due to change in China's GDP or income is 2.2. This suggests that South African exports to China are elastic to changes in Chinese income. On average, all the countries' demand for imports of goods from 2015 onwards is expected to grow by at least 5 per cent except for SA and the USA. The key question however is which of the trading partners will be responsible for the South Africa's projected export growth? The next step is to look at the growth of South African exports and possible drivers of this growth.

Domestic outlook

In this section we use each country's share over the recent past three years in South Africa's total exports to the world to make projections about the countries that might drive South Africa's export growth. Table 6.3 shows that South Africa's exports will on average grow at a rate of 5 per cent per annum and the last column shows that over the recent past three years, 27.49 per cent of South African goods were exported to the rest of Africa, followed by other countries (at 23.3 per cent), the EU (19.07 per cent) and China (11.11 per cent). Thus countries or regions discussed in the earlier chapters represent about 77 per cent of South Africa's exports.

Table 6.3
Drivers of exports growth in South Africa

	2015	2016	2017	2018	Average export share for the past three years
SA Exports growth	4.735	5.055	5.092	5.613	
Drivers of the above export growth					
Brazil	0.037	0.039	0.039	0.043	0.77
Russia	0.017	0.019	0.019	0.021	0.37
India	0.162	0.173	0.174	0.192	3.42
China	0.526	0.562	0.566	0.624	11.11
USA	0.372	0.397	0.400	0.440	7.85
Japan	0.313	0.334	0.336	0.371	6.61
EU	0.903	0.964	0.971	1.070	19.07
Africa	1.302	1.390	1.400	1.543	27.49
other	1.104	1.179	1.187	1.309	23.31

Source: World Economic Outlook, October 2014, ITC Trade Map

The first column in table 6.3 shows that the 4.735 percentage growth rate in SA exports will mostly be driven by Africa (1.3 per cent) and the EU (0.9 per cent). Less than 0.4 per cent of this export growth will be driven by exports to Brazil and Russia. Generally the ranking of trade relations between South Africa and these partners has been stable since 2010 and therefore the same shares were applied to all the yearly projections up to 2018. This means that Africa, the EU and China will be the regions or countries that will continue to drive South Africa's future export growth. The growth outlook of these countries is therefore particularly important to South Africa. In the world economy these countries contribute about 38 per cent of total output and their growth can translate into massive demand for South African export products.

On the other hand, South Africa's imports are expected to grow at an average of 4.5 per cent per annum for the coming four years till 2018. Using last three years' statistics, the largest source of South African imports is the European Union followed by China and then Africa. If this pattern of demand for imports by South Africa from these sources does not change then the forecast growth in imports by the country would be driven mostly by the EU, China and Africa. Table 6.4 also show that Brazil and Russia are generally an insignificant source of imports for South Africa. Thus the amount of imports from the whole BRIC region is only 69 per cent of what South Africa imports from the EU. Given that South Africa's imports from the World have always been greater than exports to the World, the export and imports shares in table 6.3 and table 6.4 clearly show that the country currently runs a trade deficit with the EU, Brazil, India and China.

Table 6.4
Drivers of South Africa's import growth (%)

	2015	2016	2017	2018	Average import share for the past three years
SA import	4.3	4.5	4.5	4.9	
Drivers of the above import growth					
Brazil	0.069	0.072	0.072	0.079	1.61
Russia	0.009	0.010	0.010	0.010	0.21
India	0.182	0.191	0.191	0.208	4.24
China	0.615	0.643	0.643	0.700	14.29
USA	0.306	0.321	0.321	0.349	7.13
Japan	0.194	0.204	0.204	0.222	4.52
EU	1.263	1.321	1.321	1.439	29.36
Africa	0.467	0.488	0.488	0.532	10.85
other	1.195	1.250	1.250	1.361	27.79

Source: World Economic Outlook, October 2014, ITC Trade Map

How South Africa can position itself

In chapters 3 to 5 we identified products that can help South Africa promote structural transformation. In this section we discuss what South Africa can do to take advantage of these positive changes in economic outlook. Given table 6.3 above we identified that the future of South Africa's exports growth will be driven by China, Africa and the EU. In the case of China, South Africa has no comparative advantage in any of the manufactured products that it trades with China and therefore strategies must be taken to improve the competitiveness of some of the top ten

products like vehicles, machinery and plastics if possible. Additionally, because a large amount of products traded with China are primary commodities, beneficiation opportunities should be explored so as to add value to these products and realise higher export revenues. Miscellaneous chemical products and impregnated or coated textile fabric remain important for Brazil; salt and sulphur are critical for Russia; and pulp of paper, tanning and dyeing extracts are significant for India as discussed in chapter 3.

With regards to EU, South Africa needs to improve the competitiveness of products like beverages and furniture whose demand from the EU is increasing whilst for Africa, SADC in particular, products like printed books and inorganic chemicals are experiencing an increase in demand but South Africa is losing competitiveness. There is a need to understand why this is the case and then initiate appropriate strategies to increase the share in these markets and to drive structural transformation. For USA, manufactures like beverages and furniture whilst for Japan vehicles are some of the products that appear to be losing competitiveness and market share. South Africa needs to find ways of changing this if she wants to benefit from the projected income increases in these countries.

Possible Risk factors

Trade growth is not only achieved by designing and implementing good export promotion strategies or policies, but by also encouraging an enabling macroeconomic and political environment in the trading partner countries. The 2008-2009 financial crises had a huge ripple effect on a number of countries in the developed world and most of these economies have not completely recovered from this shock. In Europe, the public debt crisis which affected Poland, Italy, Greece and Spain (PIGS) threatened the stability of the Eurozone and its single currency. There are fears that the Eurozone is sliding into a recession and this would spell disaster for countries like South Africa and others that have strong trading relations with this regional trading block. The poor growth forecast for the region discussed above bears testimony to that fact that Eurozone is not yet out of the woods.

In Russia, western sanctions over the Ukraine crisis, sharp falls in global oil prices and the ruble's slide against the dollar and increasing domestic interest rates are fuelling fears that the Russian economy might enter into a recession in 2015. This is not good for the BRICS region and may even threaten the very little trade that takes place between South Africa and Russia. The impact however might be worse if the Russian crisis extends to other BRIC countries that have a good trading relationship with South Africa. Still within the BRICS, a key concern amongst global investors is India's large current account deficit. The fundamentals of its current account position reflect a chronic deficit which will take many years to address and the situation is made worse by the large fiscal deficit that the country is also grappling with. The current account problem might force India to initiate measures that may negatively affect imports from trading partners like South Africa. In the case of China, the increase in the cost of migrant labour is believed to suggest that the country has reached the "Lewis turning point" and is therefore running short of surplus labour. This will not only threaten the country's comparative advantage in manufactures but might also slow its growth rate. However, the good news is that foreign producers of manufactures might now be able to compete with Chinese companies. The high wage rates are believed to have created a new class of consumers in the country (middle class) and this should get foreign producers like South Africa more excited.

Africa is a diverse continent with 54 countries with different business practices, legal systems, and cultures, so what works in Cape Town may not work in Cairo or Khartoum. Transport related problems as a result of poor transport infrastructure, customs clearing problems as well as instability in the target market due to war, civil strife and political problems poses serious trading concerns and is probably one of the reason why intra Africa trade is so low. The current terrorists' insurgences in countries like Nigeria and Kenya also affect the viability of trade in these places.

Chapter 7

Conclusion

South Africa's trade trajectory and structural change is dependent on a number of factors, which include trade openness (integration), foreign competition, research and development (innovation) and productivity amongst others. The pace of trade openness if not complimented by other policies and strategies, will not achieve the desired results as clearly highlighted by the contrasting experiences of Latin America and East Asia. South Africa therefore has lessons to learn from East Asia as it had opened up at a much faster pace compared to its major trading partners. The envisaged benefits of trade openness have not been fully exploited. The industrial policy followed by some of the countries in East Asia provided further impetus to structural change. The support from the respective governments took various forms which included providing them preferential treatment including tax deductions and exemptions for selected industries and helped them become competitive by partnering with foreign multinational corporations. Export Processing Zones (EPZs) were also put in place to attract FDI not only for export purposes but for technology transfers.

In the twenty years since the end of apartheid, the South African government has taken significant steps to liberalise trade in order to address unemployment, poverty and inequality. However, South Africa's widened exposure to the rest of the world has not in itself induced the necessary structural changes in the economy to significantly alter the export basket beyond the range of products that reflect South Africa's static comparative advantage. Despite this observation, South Africa has been driving the Africa's intra-trade agenda increasing its exports to rest of Africa from 15 per cent in 2005 to 29 per cent in 2013.

Similarly, South Africa's inclusion into the BRIC countries has created a platform for enhanced trade through cooperation both on the political and economic front. South

Africa's exports to BRICS have indeed increased but not at an envisaged level. This is primarily because South Africa's trade with most of these countries is characterised by export of raw materials and imports of manufactured goods. South Africa's significant natural resources are being extracted and exported in their raw form and not as processed or finished products. This is a serious missed opportunity for more robust, diversified and sustainable development.

South Africa's trade with the EU, US and Japan has been performing below its potential, owing to a slower recovery in these economies. Consequently, the manufactured products that South Africa needs to prioritise to increase the pace of transformation are very limited. Export diversification and exploring new markets (emerging economies with better growth forecasts) might be key for South Africa to reduce downside risks associated with developed economies.

South Africa being the most advanced economy in Africa has better infrastructure, technology and to some extent skills to become the manufacturing hub for the rest of the continent. South Africa's export share in Africa has been improving over the years. This is reflected in the number of products that South Africa has comparative advantage. The prospects of structural change are more probable in Africa than any other region though South Africa has been experiencing declining competitiveness in most of the manufactured products. South Africa is facing competition from China, EU, India and USA in Africa especially for manufactured products and this possess a threat on the rate of trade reforms. To maximise opportunities inherent in Africa, South Africa needs to boost exports in those products that are in demand in which it has gained more comparative advantage.

Overall, South Africa needs to raise its competitiveness, particularly in those manufactured products which are in high demand from trading partners but in which it is

losing or has lost comparative advantage. This will be particularly important for the country to be able to capture a significant share in the projected trade outlook. Failure to improve competitiveness will be detrimental as other countries will capture some of the South Africa's market share.

From an industrial policy perspective, South Africa needs to focus on sectors/industries in which the country has comparative advantage and put in support mechanisms to accelerate trade as highlighted in the East-Asian experience. Persistent focus or support on sectors where the country does not have comparative advantage can be counter-productive as it induces inefficiencies despite other valid socio-economic and political considerations.

Despite some of the observations highlighted, trade policy still remains an important part of South Africa's growth trajectory and requires support from all stakeholders to be able to contribute meaningfully to the reduction of poverty, inequality and poverty.

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