

THE PERSPECTIVE OF THE TRADE POLICY OF DEMOCRATIZED SOUTH AFRICA: IMPLICATIONS IN EAST ASIAN EXPERIENCE

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INTRODUCTION

Without questions, South African trade policy will have a great influence on the regional economy in the whole African continent, and also affect the future path of South African own economic development. In this respect, South Africa has already pledged itself to the rapid trade liberalization in the capacity of developed country at the GATT Uruguay Round, that should provide the fundamentals on which the new set of policies will be built. As the competitiveness of import goods goes up in the result of trade liberalization, South African firms will be put under the pressure of harsh competition. In these circumstances, how shall the government function for the national interests? What kind of policy reaction will be most desirable? This paper is going to respond to the above question consulting with reference to East Asian historical experience. It consists of four parts, that is, the determination of the policy requirements in South Africa, theoretical essay, reference to East Asian experience, and the recommendations for SA.

1. What is most needed now for SA economy?

At the beginning, the economic needs in democratized South Africa will be determined to specify the theme of the following discussion.

A. Employment, Income, Productivity

It may be not so much difficult to recognize the urgent policy requirements in South African economy because nobody will oppose that, as a top priority, South Africa must create more job to absorb its high-rate unemployment, officially 32.6%, and level up wages to equalize the income

distribution, now one of the most unequal in the world. The only policy that contributes exactly to these ends can be approved as useful for the new national interests. Policies just to help economic growth or to liberalize national economy will not be good enough. Even if South African economy considerably grows or a number of companies enjoy more profits in leaving its current economic structure intact, it cannot be qualified for "economic progress" in a true sense.

In order to achieve job creation and income advancement at once, it is indispensable to expand the scale of production with enhanced productivity. Productivity can be improved through innovations and the best way to materialize ceaseless innovating progress may be to keep enterprises in competitive circumstance like which is observed in the world market. That is one of reasons why export is so important.

B. Export Promotion

But, trade liberalization and "laissez - faire" will not be enough to lead strong - powered innovation. The world economic history said, almost every country who succeeded in economic development had been paying very intentional efforts in the various form of economic policies in order to establish own competent industries, and utilized trade policy as an important element of this initiative. Export promoting policy, for example, functions not only to stimulate innovation through the world competition but also to earn foreign exchange which will be needed to import capital goods embodying new technology.

Very few exceptions will be able to depend on domestic demand - and - supply for sustainable economic growth like the USA who has 250 million population, however, even the US had a period of export - orientation at the early stage of its development. Particularly for small countries who do not have enough size of domestic market, export may be the most promising means to expand production and to vitalize innovation. Most serious growth restriction for Japan in 1960s was the availability of foreign exchange, that we called "the balance of payment ceiling". An economic boom made import increase to the limit put by the availability of foreign exchange, then the Government turned its stance to calm down a boom. It is a almost same story as South Africa during 1980s. Japan has a relatively large size of domestic market, nevertheless it always needed to increase exportation to raise that "ceiling" in order to let economic booms continue longer.

2. Theoretical essay for industrial policy

A. Dynamic Economics

What kind of social phenomenon can be called "economic progress"? It can be described as a long-run and dynamic process in which both of production and consumption continually (not cyclically) increase causing structural transformation of economy and the improvement of social welfare. To consider such enlarging process of national economy in the long run, the familiar approach based on the static equilibrium is no longer useful. The neo-classical theory regards innovation as exogenous impact coming from the outside of economy, although most striking historical characteristics of the world economy since the Industrial Revolution has been very rapid progress of production technology. The enterprise in the capitalistic system is never a passive recipient of new technology but always looking for innovation as its principle of behavior. Every developed country has been expanding its economic capacity through a series of innovation endogenously brought about, and returns was continually increasing as production costs was diminishing through innovation.

B. Diminishing Cost Assumption

Therefore, we must think about implications of "increasing return = diminishing cost" case to deal with developmental phenomena, instead of traditional "diminishing return" assumption that the market can attain static equilibrium in a classical way. The production function explaining diminishing cost was proposed by A. Marshall almost one hundred years ago¹⁾, and "learning by doing model" composed by K. Arrow²⁾ will be recalled as one of recent works in the same context. In Japan, Professor Murakami's final work³⁾ was trying to build the framework for the new economics based on the diminishing cost proposition.

In the diminishing cost assumption, the main competition deploys in the field of investment. Investment gives you more and better production capacities. The more you produce, the less cost you pay, and the better profit you get. While price-takers in the neo-classical model adapt peacefully their level of production to the given price, enterprises in the real world aggressively contest a market share. It could be the case the enterprise who adopts a newly innovated technology takes all market share just like "innovator" in Schumpeter model⁴⁾. The concept of optimum volume of

production is no more assumed at the diminishing cost proposition because each company supposes that the marginal cost will decrease according to production scale. Only this type of industry will be able to realize economic development effective in bringing income advancement. It is the world of "take all or nothing", not of co-existence among all participants within each current capacity. Such investment competition for scale merits is rather destructive and never ceases until a monopolistic situation comes in or any sort of social coordination is arranged.

C. Implications for Labor

Let turn to the next question what determines the level of employment and wage. The wage level is decided in principle by demand - and - supply of the labor market which is segmented into various strata according to various professions and skill levels, and the volume of employment is adjusted according to the given wage in the labor market. While wage may be agreed between labor and management in reality, the most desirable wage and employment in an economic sense have nothing to do with the power balance of labor and management.

The optimal level of wage and employment can be shifted in the long run. Increasing wage and employment at the same time, upward shift of the demand curve in the labor market in other words, will be made possible by enhanced marginal productivity of labor. Following the above argument, productivity can continually improve only in the diminishing cost industries. Such industries must be selected for a policy target in order to attain job creation and income advancement at once. This proposition will be reflected as "dynamic comparative advantage" in the field of trade policy.

D. Industrial Policy

We can now establish the definition of the industrial policy according to Professor Murakami⁵⁾;

- (a) The industrial policy promotes investment in the purpose that diminishing cost phenomenon shall emerge,
- (b) on the other hand, prevents the destructive effects of investment competition which has no equilibrium point.

These two characteristics make ambivalence of the industrial policy,

because it is competition oriented in the respect to (a), but sometimes anti-competition in (b). The ordinal argument over the industrial policy, namely targeting, protection for infant industries, dynamic comparative advantage, export promotion, industrial coordination, temporary approval of cartel, etc., could be regarded as different reflections of its two features. It is important that each variety mentioned here must not be translated straight as the industrial policy itself. Its essence exists in the political response toward diminishing cost phenomena which should be accompanied with successful economic development. All sorts of policies for diminishing cost industries will have connection with the industrial policy.

E. Foreign Direct Investment

While technological innovation is the mainstay to diminish production costs, foreign direct investment (FDI) can be also recognized as a means for the same end. Because the enterprises want to organize their own production system into the most profitable form, they are going to locate geographically each section of the production process at the best spot. As parts of this strategy, FDI will build overseas plants if it seems more profitable than domestic production. For example, in case some country is protected by high trade barriers like South Africa until recent, FDI is a solution for foreign companies to penetrate its market. This is called "Trade Barrier Hypothesis" or "Mundell case". And also FDI shall be attracted to the country who has low-priced and high efficient production factors, since foreign companies will utilize these potentiality to produce goods with lower costs. This case was proposed by Professor Kojima and he divided it in two categories, that is, "American type" in which MNCs (Multinational Corporations) invest overseas based on its technical advantage, and "Japanese type" on the other hand, in which industries who had lost comparative advantage are transferred one by one to developing countries. The latter shares the same concept with Akamatsu's "Flying Geese Development" or "Product Cycle Theory" of Raymond Vernon. Despite Mundell case cannot expect exportability from FDI inflow, Japanese type of FDI gives an additional potential of export because foreign companies can invest for exportation back to their own countries or others. The enterprise keeps international competitiveness by diminishing production costs in utilizing overseas production factors, most importantly cheap labor.

3. East Asian experiences in 1980s

In this section, I try to explain from the view-point of the diminishing cost proposition the rapid expansion of Asian regional economy and the reinforcement of its mutual connection since 1980s.

A. Japanese FDI

Japan made the two epoch-making decisions in the middle of 1980s. At first, the series of measures for financial liberalization was announced in 1984, that opened the door to the world assets for the financial accumulation in Japan which had been confined for long. The other was the 1985 Plaza Agreement which made Japanese yen appreciate remarkably from 240 yen per dollar to 140 in two year.

Owing to this hike of exchange rate, Japanese economy became rather inward-oriented and maintained economic growth by domestic demand. The contribution of outside demand (export minus import) to GNP growth turned negative from 1986. On the other hand, the volume of capital outflow from Japan showed a explosive increase, as a part of which Japanese FDI swelled up (see Table 1). Japan became the biggest FDI supplier of the world in 1988. So to say, FDI substituted for export.

Japanese FDI had steadily grown even before 1980s but used to be basically limited to trade-connecting fields. Its main purpose in the manufacturing sector was to penetrate trade barriers of developing countries or to avoid trade frictions with developed countries. The biggest portion went to the overseas mining sector securing stable supplies of industrial input. However, the most remarkable increase since 1986 was observed in FDI to the banking/insurance sector and real estates in developed countries, especially in the US. These are quite noticeable phenomena but not the issue of this paper. We will focus here on FDI flow into Asian region.

While Japanese FDI to Asian countries was a minor portion occupied only 12% of the total in 1989 when Japanese FDI hit the peak, its amount was considerably growing from 1985 to 1989 and more quickly recovered in 1990s (see Figure 1).

B. Industrial Realignment in Asia

FDI to Asian countries is rather oriented to the manufacturing sector. Japan had once overcome the Oil Crises during 1970s through technological

innovations in the form of energy - saving investment. However, such solution seemed no longer feasible because some portions of Japanese products completely lost their international competitiveness due to the unexpectedly rapid appreciation of yen in late 1980s. The different type of investment was hence explored, that is, FDI to transfer some sections of domestic production capacities to Asian neighbors who had more favorable exchange rates with good and cheaper labor forces (see Table 2). It is the quite internationalized means to decrease production costs, that is able to make the enterprise survive among the world - wide competition. As economic progress through expansion of diminishing cost industries transforms domestic economic structure, FDI movement along the Product Cycle Theory will re-align international economy. That happened in East Asia in these 10 years.

We find in Table 3 that Japanese FDI was shifted its main target gradually from NIES to ASEAN countries and PRC since the labor costs in NIES was multiplied (see Table 4). This is a proof that Japanese FDI in the Asian region can be fine explained with the Product Cycle Theory. Professor Watanabe called the influence of the Japanese policy changes over respective Asian country "Japan Effects"⁶⁾.

C. Advance of NIES

This transfer of production capacities had expanded very rapidly until 1990 when Japanese economy sunk into the most serious depression since the Second World War. NIES took over the role of FDI supplier for Asian region after Japanese FDI stagnated. As the currencies of NIES appreciated very rapidly following yen in late 1980s (see Figure 2), South Korean economy, for instance, turned inward - oriented like Japan and the contribution of external demand to GNP turned negative from 1989. And FDI provided by overseas Chinese network was quite activated specially toward the coastal regions of PRC. In the result, the overall size of FDI inflow to Asia continued to grow in spite of Japanese depression (see Table 5). The amazing economic expansion of the PRC coastal regions is fairly fuelled with NIES' FDI. Asia became the biggest recipient of the world FDI inflow in 1993 when more than 60% of the whole FDI in the world came to Asian region with 26% to PRC.

It is worth while to attend the fact that NIES had prepared beforehand for the new stage. South Korea made "The Heavy and Chemical Industry Plan" in 1973 which proposed to advance Korean industrial structure. This plan was based on the assumption that the comparative advantage of cheap labor was going to disappear, and that some heavy industries could be

transferred from Japan who was losing the advantage in those sectors. This initiative was undertaken from the middle of 1970s notwithstanding the IMF/World Bank's opposition⁷⁾. Singapore too drew out in 1979 so-called the plan for economic reorganization, which aimed at transformation of Singaporean economy from labor-intensive to capital- and technology-intensive one. The high-wage policy along that plan had effect to promote the transfer of labor-intensive industries from Singapore to Malaysia in 1980s⁸⁾. In Taiwan, the Government paid very active efforts to attract foreign capital in the electric industries from 1960s and had been providing various incentives to those sectors with the result that electric goods become the biggest export items exceeding fiber-related in 1984⁹⁾.

D. ASEAN Development

1985, the year of the Plaza Agreement, was a very bad year for ASEAN countries, and even Singapore experienced minus growth rate. Malaysia, for example, suffered large I=S gap to the extent of 15% of GDP, 20% budgetary deficit, and 10% balance of payment's deficit. Its foreign debt climbed to 40% of GDP with 15% of DSR. Malaysian Government soon reacted with deregulation measures which shelved the racial consideration of "Bumiputra Policy". They promulgated in 1986 the Promotion of Investment Act which approved 100% foreign ownership. Then Malaysian economy resumed high economic growth (see Table 6) as one of main recipients of Japanese FDI which were coincidentally expanding in that period (see Table 7). A Malaysian economist said that "historic Japanese opportunity" had come. In fact, some Japanese electronics companies transferred the production capacities of several kinds of their products to Malaysia in full scale. These capital movements developed the horizontal integration in which Malaysia is assigned to middle-grade products and Japan for high-tech ones. Table 8 shows the size of increase in the latter half eighties by each sector among Japanese FDI to Asian countries. The biggest differentials are found in the financial/insurance sector caused by Japanese financial liberalization, and also in the electrical goods production in the context of the Product Cycle Theory. Electronic components and parts became the biggest items of Malaysian exportation exceeding crude oil export in 1986. These industrial transfers did not happen by accident but was facilitated very intentionally. Table 9 and 10 shows the policy reaction to "historical opportunity" in the respective country, and Malaysia was the front-runner to introduce 100% foreign ownership.

E. Trade Structure

The realignment of the regional production structure in East Asia has been necessarily accompanied with the change of the trade structure. Table 11 shows the historical change of the world trade matrix. The internal trade among East Asia increased weight from 30.4% in 1970 to 42% in 1991, and its import capacity from the world grew 11.4% to 19.3%. NIES' import is expanding almost everywhere with the result that East Asian region now have another Japanese size of market. The tireless efforts of Asian capital pursuing more profitable production with diminishing costs has established the very dynamic regional economy, where full employment and income advancement in each member country has been realized.

4. Implications for SA

We see above that the policy requirements in South Africa, namely job creation and income advancement, have been exactly attained in Asia. The World Bank report *The East Asian Miracle* said "the HPAEs -- high performing Asian economies -- are the only economies that have high growth and declining inequality" (see Figure 3)¹⁰⁾. Next, it will be tried to specify the implications in East Asian historical experience.

Although it will take a while for the South African new trade policy to shape up, it might be possible to see its direction in collecting signs. The most important indication comes from South African commitment to the GATT/WTO since it is obliged to "bring national legislation into conformity with the Uruguay Round/WTO requirements"¹¹⁾. The mainstay of those is a 30% cut of tariffs on average in five to ten years in exchange for MFN (most favored nation) status. Export incentives instead of the General Export Incentive Scheme (GEIS) which is against the GATT/WTO regulations will also be crucial elements to figure out the future regime. On the other hand, South Africa is requesting to participate the Lome Convention for preferential access to the EU market. The on-going negotiation to revise the Southern African Customs Union (SACU) provides another indication to learn the future of the external economic relation of South Africa. Furthermore, the trade friction with Zimbabwe with respect to the clothing and textile industry indicates its real stand against neighboring countries. In addition to the governmental attitude to various regional economic organizations, the northward advance of South African companies will create

the new situation for re-dispensation of the regional economy. However, the above actions seem to be rather passive and sometimes inconsistent each other. Anyone does not clearly tell what kind of policy stance the Government are going to hold.

Several measures of export promotion are discussed on the table, for example, rationalization of the current complicated tariff system, duty-free input regime for the exported products, establishment of an Export Bank, subsidized investment loans for export industries, and so on. But policies to support export in general might result that products seemingly giving most profit at the current comparative advantage be preferred avoiding one needed more investment to get the future advantage. The revisionist view see that some sort of selective intervention will be required "to facilitate the establishment and growth of industrial sectors that would not have thrived under the workings of comparative advantage"¹²⁾.

A. Targeting

Considering that any economic policy should be formed on a grand design of economy, it may be helpful to read the discussion in MERG Report¹³⁾ which provided the theoretical background for the current economic plan *the Reconstruction and Development Programme*. MERG report were targeting two industrial sectors to promote preferentially, that is, mineral processing for export promotion, and 'manufacturing - agricultural complex' mainly for domestic job creation.

MERG asserted that "international comparative evidence supports... that in growing economies, real wages and employment are not inversely related, and that employment is a function of aggregate demand and output (p.154)" in opposition to the classical argument that "the rate of growth of enumerated employment is determined by the changes in the cost of labor relative to capital (p.152)". As discussed in section 2, MERG's assertion will be proved only in the economy which are developing with long lasting improvement of productivity through innovations, and the industrial policy are exercised to promote such sort of industrial development in the form of diminishing costs/increasing returns. Therefore, it must be checked whether the concerned sectors have potential to diminish production costs by 'scale of economy'. Being dependent upon primary industry, the mineral processing sector would experience sooner or later the increase of the marginal cost. The same story for 'manufacturing - agricultural complex'. Additionally, its growth expected from domestic demand would be soon limited by the size of

the domestic market. Considering the level of GDP per capita and the unequal income distribution in South Africa, industrial multiplication enough to diminish production costs will be realized only through export increase. Some studies illustrated the correlation between growth rate and export performance¹⁴⁾.

B. Capital Inflow

Rapid increase of international capital movement is not the feature unique to Japan, but global trend caused by the world-wide financial liberalization. According to the survey conducted by the Bank for International Settlements, the annual magnitude of foreign exchange markets in the world was assumed to amount to \$162 trillion in 1989, while the sum of GDP of the OECD countries was estimated \$12 trillion and the world trade did only \$5 trillion¹⁵⁾.

Although global portfolio investment toward South Africa seems relatively vitalized even to be not so successful, FDI inflow will be much more crucial for South African. Mundell type of FDI which used to be a majority in South Africa will not come any more owing to tariff reductions. Then, FDI of 'product cycle' type must be attracted. Trade is not only affected by the trade policy but structurally changed by FDI. Besides various policies providing special treatment for FDI, any further merit for foreign companies must be announced to invite their presence in competition with others. In this context, the initiative of the countries situated along the Indian Ocean rim to strengthen their economic tie will function effectively, because India is a remaining frontier for Asian economic expansion. However, the level of wage in South Africa is concerned about because the Product Cycle Theory teaches that FDI moves for cheaper labor forces to diminish production costs (see Table 12).

C. Conclusion and Recommendations

Economic progress which can improve the aggregate social welfare with job creation and general income advancement is materialized through industrial development enhancing returns and diminishing costs. In order to continue that process in the long run, innovating investment must be activated to keep productivity increase. That is the justification for the industrial policy because the market will fail to facilitate this kind of development as discussed in the section 2.

We know that there was the intensive discussion about the industrial policy in South Africa in late 1980s. The GEIS was introduced after the concept of dynamic comparative advantage with selective assistance proposed by the BTI Report was abandoned because of its administrative difficulties¹⁶⁾. That due consideration should be respected. Administrative difficulties were also raised as the point of the industrial policy among economists of the World Bank¹⁷⁾. Liberal economics approach seems to be the most influential view - point in South Africa even after the RDP's publication. But, I suspect that policies of 'leaving it market' could not deal successfully with the emergent requirements of South Africa specified in the section 1. Another concern is about its labor policy. When Asian competitors put priority upon employment growth rather than high wage for some small segments in the society, what possibility to attain full - employment will be still available for South Africa who has relatively costly labor forces in respect to its development level?

Although there are certainly much difference between Southern Africa and East Asia, some implications could be found in Asian history if South Africa want to develop its economy in such way that Asian countries ever experienced. The recommendations of this paper is the followings;

- Considering the duality of South African social economy, two different industries will be targeted for export oriented growth. Fiber - related industries which generally lead the early stage of industrialization will be most suitable to the less developing area in South Africa. On the other side, electric industries which leads the middle stages may be promising sectors to be targeted for industrial urban areas. Both can expect almost unlimited market for their mass - production if being competitive.

- The best treatment for FDI inflow up to the world standard should be guaranteed as soon as possible. Technology transfer accompanied with FDI is requisite to productivity improvement. Trade was substituted by FDI gradually in some fields in the current world economy after financial liberalization. Even in Southern Africa, a little 'Geese' has already flew up from Mauritius toward Madagascar looking for more profitable production conditions (Professor Maasdorp)¹⁸⁾.

- Further depreciation of SA rand may be recommendable because it makes possible to hold real labor costs down. During 1970s and 80s, the tendency to accumulate capital in excess was observed in South African economy with the result that its capital productivity decrease considerably. That supposed to be the main reason of the decline of multi-factor productivity (see Figure 4). It should be difficult to evaluate the nature of

wage increase among non-white workers either in economics or in social contexts. Furthermore, comparatively expensive average wage suggested in Table 12 may not tell the real situation because the labor forces of South Africa are distinctly segregated. Anyway, it shall be the task of the Government to arrange economic circumstances where the most effective behavior can be fulfilled in contributing to the national interests. A part of it, the national consensus should be established by the leadership, that full-employment through industrial development must come a first priority before wage increase. East Asian historical experience shows that full-employment must come first before income advancement in order to realize a sustainable development which can successfully improve the overall social welfare.

NOTE

- 1) The concept of “external economy” and “internal economy” made by Marshall assumes ‘scale of economy’ in a non-linear way. He thought that the rate of returns would increase by the scale of production in modern industries, however his ideas was not inherited in the main stream of economics. Alfred Marshall, *Principles of Economics*, 1st ed. 1890.
- 2) Kenneth Arrow, “The Economic Implication of Learning by Doing”, *Review of Economic Study*, June 1962.
- 3) Yasusuke Murakami 『反古典派の政治経済学：二十一世紀への序説』上・下巻 (*Anti-classical Political Economy: Introduction to Twenty-one Century*, in Japanese), 中央公論社, 1992, Tokyo.
- 4) Schumpeter described capitalism as a dynamic process of economic changes and rejected the Walrasian statistic picture. In his model, the enterprise plays a central role for such economic changes called “creative destruction”. Joseph Schumpeter, *Capitalism, Socialism, and Democracy*, 3rd ed., 1950.
- 5) Murakami, op. cit., chapter 8.
- 6) Toshio Watanabe 『新世紀アジアの構想』 (The Design of Asian New Century, in Japanese), ちくま新書, 1995.
- 7) Takao Taniura 『韓国の工業化と開発体制』 (*The Industrialization and Developmental Regime in The Republic of Korea*, in Japanese), IDE Research Series No.382, IDE, 1989, pp.42-58.
- 8) Kenzo Horii (ed.) 『マレーシアの工業化：多民族国家と工業化の展開』 (*The Industrialization in Malaysia: Multi-racial State and the Development of its Industrialization*, in Japanese), IDE Asian Industrialization Series No.12, IDE, 1990, pp.259-260.
- 9) R. Inoue ; H. Urata ; H. Kohama (ed.) 『東アジアの産業政策：新たな開発戦略を求めて』 (*The Industrial Policy in East Asia: For the New Development Strategy*, in Japanese), JETRO, 1990, pp.80-82 and pp.158-176.
- 10) IBRD, *The East Asian Miracle: Economic Growth and Public Policy*, Oxford University Press, 1993, pp.2-4.
- 11) Tshediso Matona, “From GATT to the World Trade Organisation: Opportunities and Constraints for South Africa”, *Trade Policy Monitoring Project Working Paper 5*, Development Policy Research Unit, University of Cape Town, April 1995, p.16.
- 12) Alice H. Amsden, “Asia’s Next Giant: South Korea and Late

Industrialization", Oxford University Press, 1989. Quoted from IBRD, op. cit., pp.83-84.

- 13) *Making Democracy Work: A Framework for Macroeconomic Policy in South Africa, A report from the Macroeconomic Research Group (MERG)*, Centre for Development Studies, University of the Western Cape, 1993.
- 14) Anne O. Kruger, "Trade Policy as an Input to Development", *American Economic Review*, Vol.7 No.2, 1980.
- 15) The Bank of International Settlements, "Survey of Foreign Exchange Market Activity", February 1990. Quoted from Giichi Miyazaki, 『複合不況：ポスト・バブルの処方箋を求めて』 (*Complex Depression: For the Prescription of Post-Bubble Period*, in Japanese), 中公新書, 1992, pp.10-11.
- 16) The Board of Trade and Industry, *A Policy and Strategy for the Development and Structural Adjustment of Industry in the Republic of South Africa*, 1988.
- 17) IBRD, op. cit., Foreword.
- 18) From the interview with Professor Gavin Maasdorp of the University of Natal in November 1995.

Table 1: Japanese FDI

(\$ billion)

Year	Total FDI	Increase	to Asia	Increase	to USA	Increase
1980	4.69		1.19		1.48	
81	8.93	90.4%	3.34	180.7%	2.35	58.8%
82	7.7	-13.8%	1.39	-58.4%	2.74	16.6%
83	8.15	5.8%	1.85	33.1%	2.56	-6.6%
84	10.16	24.7%	1.63	-11.9%	3.36	31.3%
1985	12.22	20.3%	1.44	-11.7%	5.49	63.4%
86	22.32	82.7%	2.33	61.8%	10.12	84.3%
87	33.36	49.5%	4.87	109.0%	14.7	45.3%
88	47.02	40.9%	5.57	14.4%	21.7	47.6%
89	67.54	43.6%	8.23	47.8%	32.54	50.0%
1990	56.91	-15.7%	7.05	-14.3%	26.13	-19.7%
91	41.58	-26.9%	5.94	-15.7%	18.03	-31.0%
92	34.14	-17.9%	6.43	8.2%	13.82	-23.3%
93	36.03	5.5%	6.64	3.3%	14.73	6.6%
94	41.05	13.9%	9.7	46.1%	17.33	17.7%

Source: 大蔵省『対外直接投資届出実績』

Table 2: Incentives of Foreign Investment in Asia

(Unit: %)

	A	A	A	B	C	C	C	C	C
Low Wages	2.5	20.0	30.8	71.0	73.5	N.A.	57.9	63.0	85.7
Markets	77.5	70.5	78.5	73.0	55.9	61.1	N.A.	N.A.	N.A.
Area	ANIES	ASEAN	China	China	ANIES	ANIES	ASEAN	ASEAN	China
(Survey Year)	(1993)	(1993)	(1993)	(1993)	(1985)	(1990)	(1985)	(1990)	(1990)

A: Exim Bank of Japan (1993).

B: Kyusyu Industrial Advancement Center.

Samples Companies in Kyusyu and Yamaguchi-Prefecture: 1,921.

Effective Answers: 680 (Multiple Answers).

C: Osaka prefecture and Osaka Chamber of Commerce (1990).

Quoted from, Akifumi Kuchiki, "The East Asian Trick: A Theoretical Approach to EPZ" presented to "The World Bank-Japan Research Fair" organized by The World Bank, Tokyo, December 1995.

Table 3: Japanese FDI to Each Asian Country
(\$ hundred million)

	1985	1986	1987	1988	1989	1990	1991	1992	1951-92
South Korea	1.3	4.4	6.5	4.8	6.1	2.8	2.6	2.3	46.2
Taiwan	1.1	2.9	3.7	3.7	4.9	4.5	4.1	2.9	34.3
Hong Kong	1.3	5.0	10.7	16.6	19.0	17.9	9.3	7.4	115.1
Singapore	3.4	3.0	4.9	7.5	19.0	8.4	6.1	6.7	78.3
Thailand	0.5	1.2	2.5	8.6	12.8	11.5	8.1	6.6	58.9
Malaysia	0.8	1.6	1.6	3.9	6.7	7.3	8.8	7.0	48.2
Indonesia	4.1	2.5	5.5	5.9	6.3	11.2	11.9	16.8	144.1
PRC	1.0	2.3	12.3	3.0	4.4	3.5	5.8	10.7	44.7
India	0.1	0.1	0.2	0.2	0.2	0.3	0.1	1.2	3.3

Source: 大蔵省『対外直接投資届出実績』

Table 4: Wage Index of Manufacturing Industry
(Korea, Taiwan, Japan)
(dollar term, 1980=100)

	Korea	Taiwan	Japan
1980	100.0	100.0	100.0
1981	113.0	111.1	106.5
1982	121.5	114.8	109.9
1983	128.2	112.0	121.1
1984	133.4	123.8	125.7
1985	136.2	129.0	144.8
1986	153.7	145.3	166.2
1987	186.6	183.3	187.7
1988	258.5	194.8	203.1
1989	325.4	219.8	192.9
1990	371.0	223.2	200.3
1991	408.2	234.6	221.6

Source: Taiwan Statistical Data Book (1994).

Korean Economic Indications (1992).

Statistical Yearbook of the Republic of China (1993).

Japanese Statistics (1985-1993).

Quoted from, Akifumi Kuchiki, "The East Asian Trick: A Theoretical Approach to EPZ" presented to "The World Bank-Japan Research Fair" organized by The World Bank, Tokyo, December 1995.

Table 5: Inflow and Outflow of Direct Investments to / from Asia-Pacific Countries
(Unit: 1 million dollars)

	1980	1981	1982	1983	1984	1985	1986	1987	1988	1989	1990	1991	1992
Asia-Pacific Countries (total)													
Direct Investments (outflow)	156	89	528	288	334	982	808	1,908	5,262	8,968	8,385	5,451	6,530
Direct Investments (inflow)	2,606	3,774	4,034	3,996	4,300	4,460	5,483	7,933	12,015	13,216	17,194	19,261	25,577
Malaysia													
Direct Investments (inflow)	934	1,265	1,397	1,261	797	695	489	423	719	1,668	2,332	4,073	4,118
Thailand													
Direct Investments (inflow)	190	291	191	350	401	163	263	352	1,105	1,775	2,444	2,014	2,116
Indonesia													
Direct Investments (inflow)	180	133	225	292	222	310	258	385	576	682	1,093	1,482	1,774
The Philippines													
Direct Investments (inflow)	106	172	16	105	9	12	127	307	936	563	530	544	228
China													
Direct Investments (outflow)	n.a.	n.a.	44	93	134	629	450	645	850	780	830	913	4,000
Direct Investments (inflow)	n.a.	n.a.	430	636	1,258	1,659	1,875	2,314	3,194	3,393	3,487	4,366	11,156
South Korea													
Direct Investments (outflow)	13	42	145	126	37	34	110	183	151	305	820	1,357	1,047
Direct Investments (inflow)	6	102	69	69	110	234	435	601	871	758	715	1,116	550
Singapore													
Direct Investments (outflow)	98	15	304	49	92	238	181	206	117	882	1,352	1,160	1,347
Direct Investments (inflow)	1,236	1,660	1,602	1,134	1,302	1,047	1,710	2,836	3,655	2,773	5,263	4,395	5,635
Taiwan													
Direct Investments (outflow)	42	60	33	19	70	80	66	704	4,120	6,951	5,243	1,854	
Direct Investments (inflow)	166	151	104	149	201	340	326	715	959	1,604	1,330	1,271	

Source: IMF

Compiled by Akira Kosaka (Koichi Ono, Yumiko Okamoto, eds. *EC, NAFTA, East Asia and Direct Foreign Investments*, Institute of Developing Economies, 1995).

Quoted from, Akifumi Kuchiki, "An Asian Trick in the Miracle: EPZ model" presented to "The World Bank-Japan Research Fair" organized by The World Bank, Tokyo, December 1995.

Table 6: Economic Growth, Unemployment and Export (Malaysia)
(Unit: %)

	GDP Growth Rate	Unemployment Rate	Export Growth Rate
1985	-1.1	6.9	0.0
1986	1.2	8.3	23.1
1987	5.4	8.2	32.5
1988	8.9	7.9	32.0
1989	8.8	7.1	36.2
1990	9.4	5.6	28.1
1991	8.0	4.3	31.2

Source: Bank Negara Malaysia, *Economic Report*, 1992.

Quoted from, Akifumi Kuchiki, "The East Asian Trick: A Theoretical Approach to EPZ" presented to "The World Bank-Japan Research Fair" organized by The World Bank, Tokyo, December 1995.

Table 7: Foreign Investment to Malaysia in Approved Projects

(Unit: million M\$)

	1984	1985	1986	1987	1988	1989	1990
	Country	Country	Country	Country	Country	Country	Country
	Value	Value	Value	Value	Value	Value	Value
1	Japan	Japan	Holland	Japan	Japan	Japan	Taiwan
	67.3	81.7	180.3	230.8	561.1	1,065.3	2,353.3
2	Singapore	Singapore	Singapore	Singapore	Taiwan	Taiwan	Japan
	38.5	47.2	90.0	135.4	384.3	1,013.0	1,777.6
3	U.S.	U.S.	Japan	Taiwan	U.S.	Singapore	Singapore
	21.3	36.8	58.1	118.5	252.6	269.5	321.3
4	Luxembourg	Hong Kong	Hong Kong	U.S.	Singapore	U.K.	U.K.
	17.0	18.4	27.5	61.3	172.1	255.5	315.4
5	Taiwan	Taiwan	U.K.	Australia	France	U.S.	Indonesia
	14.0	14.7	19.1	29.7	131.8	126.8	224.6
Total	-	-	-	-	-	-	-
	275.4	324.9	524.5	750.0	2,010.5	3,401.1	6,227.9

Source: Takeshi Aoki, *Industrial Strategy of Export-Led Growth*, Jetro, 1993, pp.30-31.

Quoted from, Akifumi Kuchiki, "The East Asian Trick: A Theoretical Approach to EPZ" presented to "The World Bank - Japan Research Fair" organized by The World Bank, Tokyo, December 1995.

Table 8: Japanese FDI to Asian by Sector

(\$ million)

	1985	1988	differential
food	34	90	56
fabrics	8	149	141
wood & pulp	4	177	173
chemicals	39	200	161
ferro & nonferrous metal	36	205	169
machinery	76	259	183
electrical goods	51	852	801
transport equipment	151	155	4
miscellaneous	60	284	224
manufacturing total	459	2,371	1,912
agric. & forestry	2	14	12
fishery	10	25	15
mining	316	235	-81
construction	31	100	69
trade	137	432	295
financial & insurance	168	1,062	894
services	193	538	345
transportation	81	191	110
real estate	15	384	369
miscellaneous	5	2	-3
non-manufacturing total	958	2,983	2,025

Source: 大蔵省『財政金融統計月報』

Table 9: Factors of Permission for 100% Ownership by FDI

Thailand (1983)	Malaysia (1986)	Indonesia (1994)
<ol style="list-style-type: none"> 1. Recession in the early 1980s (4-5%) 2. Expansion of the fiscal deficit 3. Shift from import substitution policy to export-oriented policy due to saturation in the domestic market <p>(a drastic increase in FDI after the Plaza Agreement in 1985)</p>	<ol style="list-style-type: none"> 1. Negative rate of Economic growth since the 1950s 2. Shift of emphasis on the private sector due to increase in the fiscal deficit caused by expansion in the public sector since the early 1980s 3. Export-oriented policy 4. A drastic decrease in the share of ownership of capital by foreign investors (25.5% in 1985) 	<ol style="list-style-type: none"> 1. A drastic increase in FDI to neighboring Asian countries including Vietnam and India 2. Necessity of FDI into industries of production for domestic markets <ol style="list-style-type: none"> (1) To invite supporting industries for export-oriented industries (2) Infrastructure (Shortage in capital) 3. Importance of the private sector due to constraint of the fiscal budget

Source:

Thailand: Mikimasa Yoshida, "Thailand," *Development and Environment 4* (R.Kojima & N.Fujisaki eds.), Institute of Developing Economies, 1994.

Malaysia: Mutsuo Kimura, "Bumiputra Policy and Change in the Economic Structure," *Change in the Social and Economic Structure of Malaysia*, (K.Horii & N.Hagiwara eds.), Institute of Developing Economies, 1988.

Indonesia: Kazuhisa Matsui, "Development in Manufacturing industries and Industrial Policy," *Study on Japanese Cooperation in Industrial Policy for Indonesia*, Institute of Developing Economies, 1995.

Quoted from, Akifumi Kuchiki, "An Asian Trick in the Miracle: EPZ model" presented to "The World Bank-Japan Research Fair" organized by The World Bank, Tokyo, December 1995.

Table 10: Examples of preferential policies in Malaysia, Thailand and Indonesia

	Malaysia	Thailand	Indonesia
Reduction or exemption of import tariff	Import of machines which are not manufactured domestically is exempted from tariff and sales tax.	In the First District (six prefectures around Bangkok): In terms of machines and others, more than 80% of total sales amount is exported, import tariff is reduced by 50%	Import tariff is exempted on machines and parts. However, import tariff on supplementary equipment is reduced by 50%
Preferential measure on corporate tax	Venture firms: 30% of the legally-defined taxable income will be taxed for five years from the date of the start of production. Deduction of investment tax amount: 60% of applicable capital spending that arose within five years of obtaining permit will be deducted with the maximum of the equivalent of 70% of the legally-defined taxable income.	The First District: Corporate tax will be exempted for three years if more than 80% of total sales amount is exported	None
Export finance	○	○	None
Export insurance	○	○	None
Export Processing Zone (EPZ)	Conditions for tenants in Free Trade Zone: Export of all products (in some cases 80%) Penang (1971)	Conditions for tenants in Export Processing Zone: Export of all products Lad Krabang (1979)	Conditions for tenants in Export Processing Zone Jakarta (1986)
Permission for 100% ownership of capital by FDI	Permission to set up full subsidiaries (if 80% of all products are exported); in FTZ, import tariff on raw materials and others are exempted. (1986)	Permission to set up full subsidiaries; in EPZ, import tariff on machines and raw materials and exempted. (1983)	Permission to set up full subsidiaries; in EPTE (1993, amended in June 1994); in EPTE, import tariff on raw materials and capital assets are exempted. (1994)
Support by export promotion agencies	Malaysian Industrial Development Authority	Board of Investment	Badan Koordinasi Penanaman Modal (Investment Coordination Agency)

Quoted from, Akifumi Kuchiki, "An Asian Trick in the Miracle: EPZ model" presented to "The World Bank - Japan Research Fair" organized by The World Bank, Tokyo December 1995.

Table 11: Trade matrix

(% share)

From \ To		E. Asia	Japan	NIES	ASEAN	PRC	USA	EC12	World
East Asia	1970	30.4	6.9	13.9	7.7	1.9	27.5	13.5	100.0
	1980	35.2	11.2	14.2	7.3	2.5	21.9	14.2	100.0
	1990	39.7	8.7	19.6	7.3	4.1	26.1	16.3	100.0
	1991	42.0	8.4	21.2	7.5	4.9	24.1	16.4	100.0
Japan	1970	23.9		13.7	7.2	2.9	31.1	12.1	100.0
	1980	25.8		14.8	7.1	3.9	24.4	13.9	100.0
	1990	29.6		19.7	7.8	2.1	31.7	18.8	100.0
	1991	32.1		21.3	8.1	2.7	29.3	18.9	100.0
NIES	1970	30.8	11.7	7.9	10.8	0.5	31.8	16.0	100.0
	1980	32.5	9.9	9.7	10.8	2.0	24.6	16.4	100.0
	1990	40.5	11.3	12.4	8.9	7.9	26.9	15.4	100.0
	1991	42.2	10.4	13.5	9.1	9.1	24.5	15.6	100.0
ASEAN	1970	53.7	27.4	18.5	7.4	0.5	19.6	16.1	100.0
	1980	58.3	37.7	16.3	3.5	0.7	17.9	12.4	100.0
	1990	53.4	25.0	21.8	4.5	2.1	18.9	15.9	100.0
	1991	53.5	23.8	23.1	4.2	2.3	18.1	16.0	100.0
PRC	1970	37.4	9.9	23.2	4.2		0.0	13.3	100.0
	1980	47.1	19.5	22.7	5.0		5.2	12.4	100.0
	1990	63.0	14.3	45.9	2.8		8.2	9.2	100.0
	1991	67.6	14.3	50.4	2.9		8.6	9.5	100.0
USA	1970	16.2	10.7	3.5	2.0	0.0		28.1	100.0
	1980	20.7	9.6	6.6	2.7	1.8		26.2	100.0
	1990	26.7	12.4	10.4	2.8	1.2		24.9	100.0
	1991	26.6	11.4	10.8	2.8	1.5		24.5	100.0
EC12	1970	3.4	1.2	1.0	0.8	0.4	8.3	53.3	100.0
	1980	3.2	1.0	1.2	0.7	0.4	5.5	55.5	100.0
	1990	5.7	2.1	2.1	1.0	0.5	7.1	60.6	100.0
	1991	5.8	2.0	2.3	1.0	0.5	6.4	61.8	100.0
World	1970	11.4	6.0	2.8	1.6	1.0	12.7	39.6	100.0
	1980	13.9	6.6	4.2	1.9	1.2	11.9	36.5	100.0
	1990	17.8	6.2	7.4	2.7	1.5	14.8	40.7	100.0
	1991	19.3	6.2	8.4	2.9	1.8	14.2	40.5	100.0

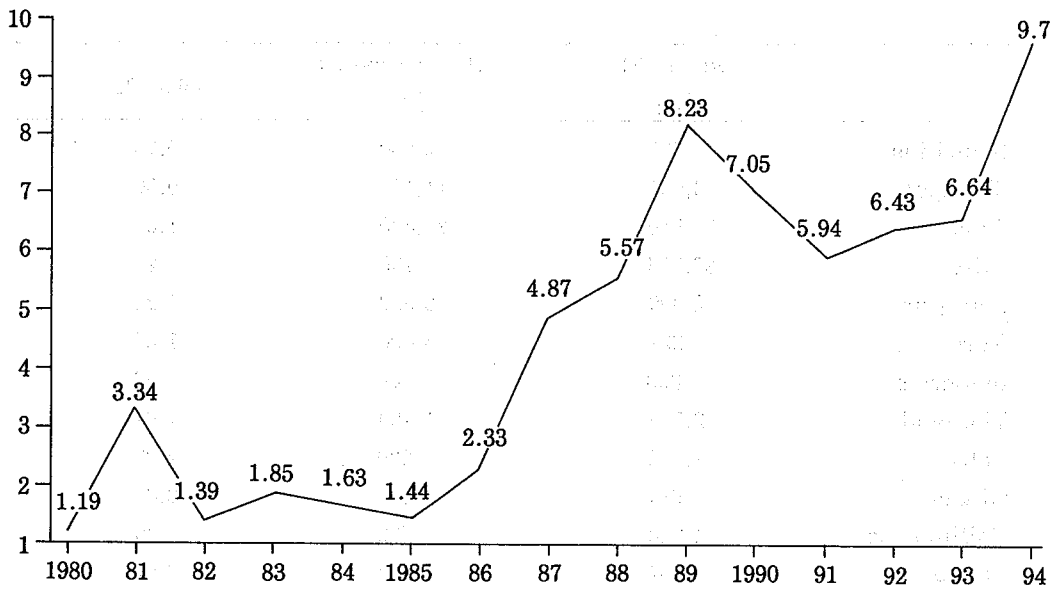
Source: IMF, "Direction of Trade", IDE Database "AIDXT". Quoted from 北村かよ子 編『東アジアの工業化と日本産業の新国際化戦略』(Kayoko Kitamura (ed.), *The Industrialization of East Asia and The New Globalization Strategy of Japanese Industries*), IDE Economic Cooperation Series No. 176, IDE, 1995, p.19.

Table 12: The ratio of average wage in the manufacturing sector to GDP per capita (1990)

	wage (\$) [a]	GDP percap.(\$) [b]	[a]/[b]
Mauritius	1,566	2,250	0.70
Singapore	8,931	11,160	0.80
Japan	26,840	25,430	1.06
USA	26,356	21,790	1.21
Malaysia	2,899	2,320	1.25
Korea, Rep.	7,221	5,400	1.34
Indonesia	898	570	1.58
Thailand	2,709	1,420	1.91
Bolivia	1,408	630	2.23
Ghana	961	390	2.46
Philippines	1,818	730	2.49
Congo	5,234	2,040	2.57
Brazil	7,008	2,680	2.61
South Africa	6,636	2,530	2.62
Gabon	9,520	3,330	2.86
Tanzania	358	110	3.25
Nigeria	1,202	290	4.14
Senegal	3,941	710	5.55
Kenya	2,066	370	5.58
Zimbabwe	3,751	640	5.86
Cameroon	7,446	960	7.76
Zambia	4,980	450	11.86
Cote d' Ivoire	10,586	750	14.11

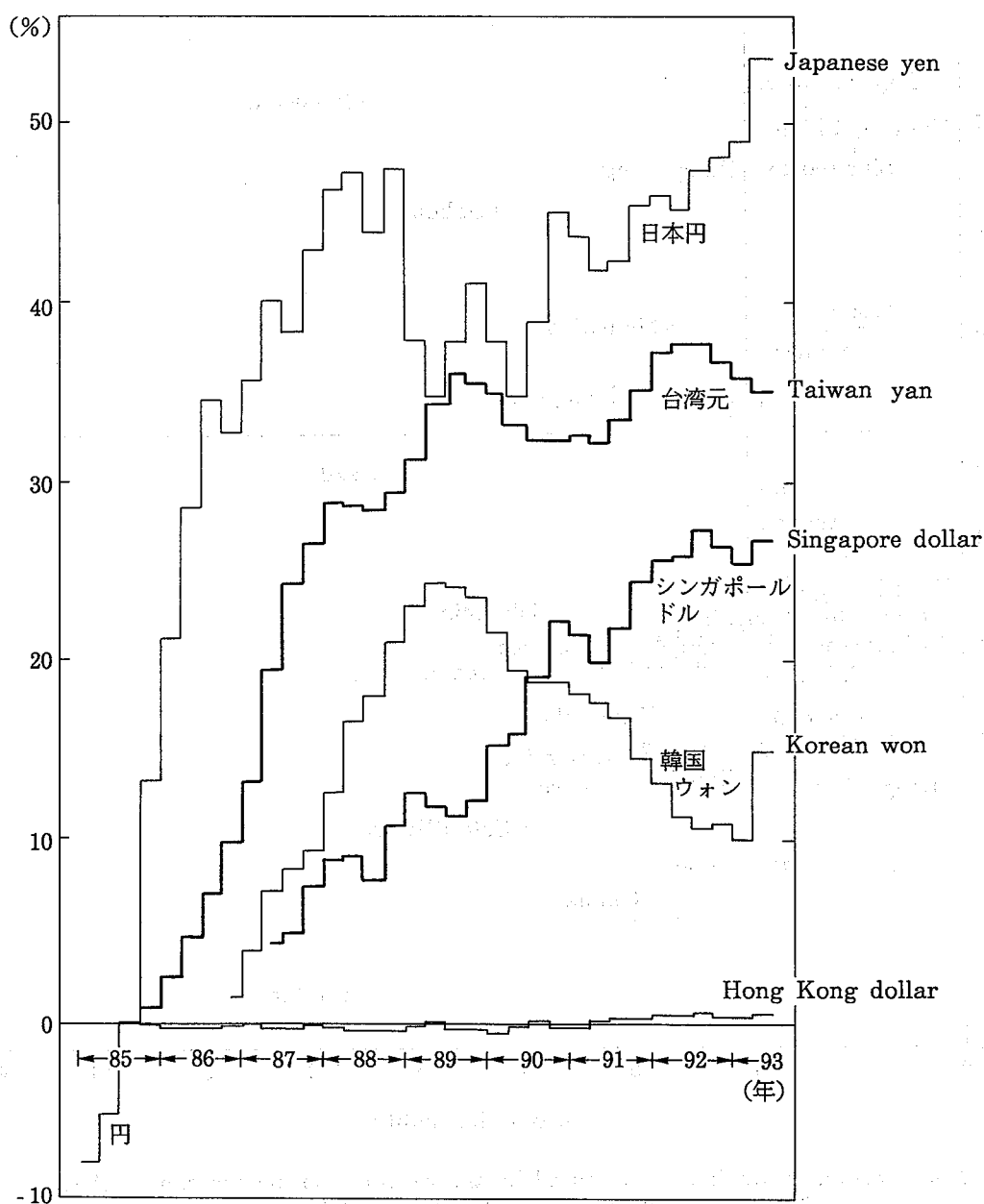
Source: UNIDO, *Industry and Development Global Report 1991/92*
& World Bank, *World Development Report 1992*.

Figure 1: Japanese FDI to Asia
(\$ billion)



Source: 大蔵省「対外直接投資届出実績」

Figure 2: The appreciation of Asian Currencies to US dollar
(third quarter of 1985=0)

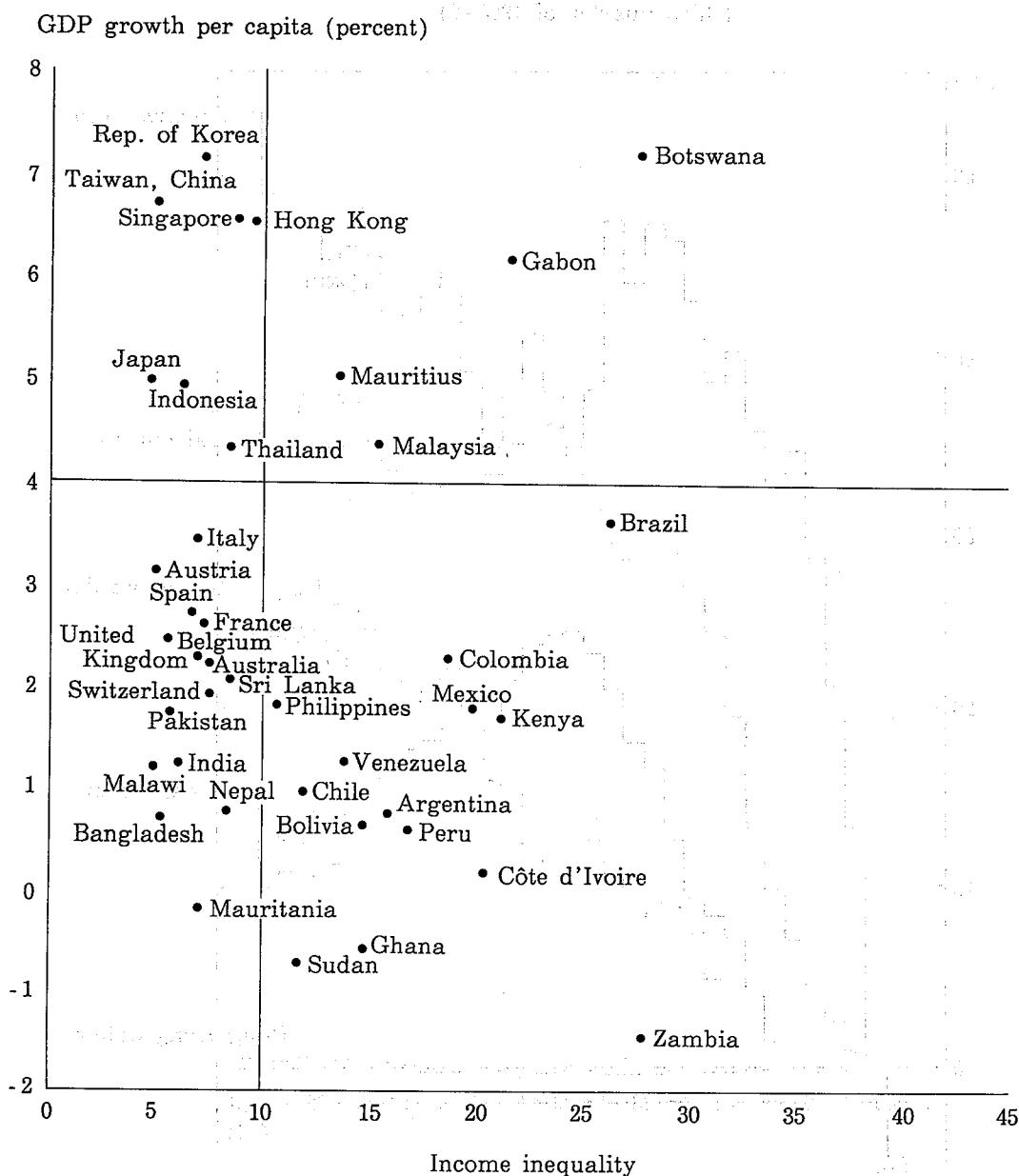


(注) 4 半期ベース、1985年Ⅲ 4 半期をゼロとする。

(資料) IMF, *International Financial Statistics*, various issues.

Quoted from, Toshio Watanabe, 『新世紀アジアの構想』 (*The Design of Asian New Century*, in Japanese), ちくま新書, Tokyo, 1995, pp.161.

Figure 3: Income Inequality and Growth of GDP, 1965 - 89



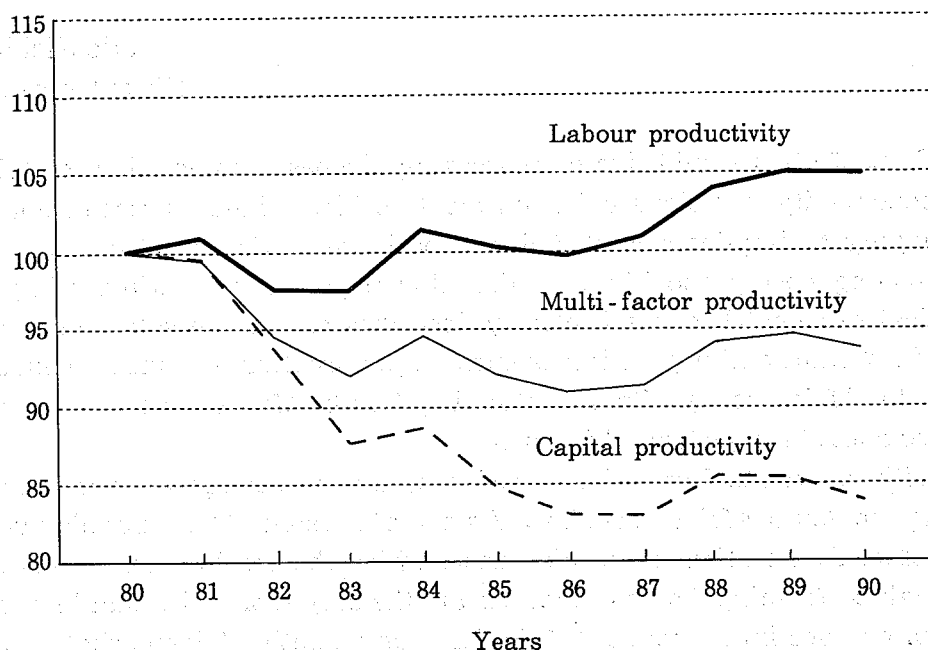
Note: Income inequality is measured by the ratio of the income shares of the richest 20 percent and the poorest 20 percent of the population.

Source: World Bank data.

Quoted from, *The East Asian Miracle: Economic Growth and Public Policy*, A world Bank Policy Research Report, Oxford University Press, 1993, p.31.

Figure 4: Multi-factor productivity, private non-agricultural sectors

Indices 1980 = 100



Source: National Productivity Institute, 1991, p.43

Quoted from, Frans Barker, *The South African Labor Market: Critical Issues for Transition*, J.L. van Schaik, Pretoria, 1992 p.65.