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Volume Title: Liberalization Attempts and Consequences

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Volume Publisher: NBER

Volume ISBN: 0-884-10483-4

Volume URL: <http://www.nber.org/books/krue78-1>

Publication Date: 1978

Chapter Title: The Ten Countries and Their Payments Regimes

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Chapter URL: <http://www.nber.org/chapters/c3851>

Chapter pages in book: (p. 12 - 41)

## Chapter 2

# The Ten Countries and Their Payments Regimes

The economic characteristics of the ten countries covered in the NBER project are described in this chapter. There are two broad bases upon which the relevant features of these countries' economies will be examined: their growth and structure, and their experience with trade and payments regimes. This examination should provide some background for the more detailed discussions of later chapters and also give an indication of the degree to which the countries can be regarded as representative of other developing countries.

In the first section the size, income level, sectoral composition of output, and other pertinent characteristics of growth and structure of the project countries are considered. The next section outlines hypotheses about the historical sequence of the phases of exchange control regimes. These phases were formally developed in the analytical framework stage of the project, and they have been used as reference points throughout the project. The phases provide a convenient framework for tracing experience with trade and payments regimes in the ten countries, and that is done in the third section of this chapter.

### I. ECONOMIC CHARACTERISTICS OF THE PROJECT COUNTRIES

The ten countries for which detailed studies were completed were Brazil, Chile, Colombia, Egypt, Ghana, India, Israel, South Korea, the Philippines, and Turkey. Each has had balance-of-payments difficulties at various times and has employed more than one type of trade and payments regime to grapple with its problems.

Although the trade and payments regimes of these ten countries are a great deal of different from those of the industrialized American countries, three of them also differ considerably from each other.

### Size, Income, and Population

Table 2-1 contains data on the size, income, and population of the ten countries. It gives estimates of 1970 for each of the countries. As can be seen, Israel has the smallest population, with only five million people. The other countries covered in the project would be found in Table 2-1.

While comparing the size of the ten countries to wide margins of error, Table 2-1—gives a rough idea of the relative size of the countries. In both real GDP and population, the countries are smaller than the industrialized countries based on the 1970 figures. When real GDP is measured in constant prices, the small population countries are about one-fifth that of Colombia and Ghana's internal product. The Philippines are about one-fifth the size of the other countries.

The third column of Table 2-1 shows the year close to 1970 when the official country's real GDP was the highest of the group. The developing countries have developed countries' rates of her experience with rapid growth.<sup>2</sup>

The last four columns of Table 2-1 show the rates of real GDP growth for the ten countries.

Although the characteristic common to all the countries is the fact that trade and payments regimes have been central concerns of policy, there is a great deal of diversity among them with regard to other characteristics. They are representative of various geographic regions and include three Latin American, three Middle Eastern, one African, and three Asian countries. They also differ considerably in size, income level, and growth experience.

### Size, Income, and Growth Rates

Table 2-1 contains estimates of some key variables. The first three columns give estimates of population and of gross and per capita domestic product in 1970 for each of the ten countries. Estimates in terms of local currency have been translated into 1970 U.S. dollars to make them comparable across countries.<sup>1</sup> As can be seen, the ten countries vary widely in size—Chile, Ghana, and Israel have small populations; India and Brazil are large; and the remaining five, with populations between 20 and 40 million, are of medium size. The countries covered by the project are a group with larger populations than would be found in a representative sample of developing countries.

While comparisons of output levels valued in a single currency are subject to wide margins of error, the dollar value of real GDP—column 2 of Table 2-1—gives a rough idea of the size of internal markets. India and Brazil are large in both respects, although the disparity in GDP between the two is much smaller than the proportionate differences in population. However, distinctions based on population between the “small” and “medium” countries blur when real GDPs are compared. Israel’s high per capita income offsets her small population, so that her real output appears to have been more than four-fifths that of Chile in 1970, despite a population less than one-third as large. Ghana’s internal market appears to be distinctly smaller than that of the other countries included in the project, while domestic markets in Turkey and the Philippines are probably significantly larger than those in the remaining countries.

The third column of Table 2-1 gives levels of per capita product for 1970, or the year closest to it for which data are available. India’s per capita income is extremely low—less than half that of the next poorest country as judged by the official conversions. Israel’s per capita income was far and away the highest of the group. By the mid-1960s, in fact, Israel had emerged from the developing country stage. But Israel could not have been considered a developed country in the early 1950s, and was included in the project because of her experience with trade and payments regimes during the course of her rapid growth.<sup>2</sup>

The last four columns of Table 2-1 give estimated annual average growth rates of real GDP for the four five-year intervals from 1950 to 1970. Rates of

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### COUNTRIES

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**Table 2-1. Population, Gross Domestic Product, and Per Capita Product, 1970 and Real Growth Rates, 1950-1970, Ten Countries**

Country	Population (millions of persons)	Gross Domestic Product (millions of 1970 U.S. dollars)	Per Capita GDP (1970 U.S. dollars)	Average Annual Growth Rate of Real GDP (percent per annum)			
				1950-55	1955-60	1960-65	1965-70
Brazil	95	34,511	362	6.8	6.9	4.5	7.5
Chile	10	6,657	681		2.9	4.9	3.5
Colombia	21	8,648	409		4.6	4.7	5.7
Egypt	33	6,831	210		5.8		4.5
Ghana	9	2,518	279	n.a.	6.2	3.2	2.3
India	537	53,504	84	3.7	4.0	2.6	4.6
Israel	3	5,343	1,836	15.3	10.5	10.7	7.2
South Korea	32	8,141	256	5.5 <sup>a</sup>	3.8	6.3	11.1
Philippines	37	13,903	361	8.1	5.0	5.6	6.0
Turkey	35	12,799	363	6.6	5.2	4.4	7.0

n.a. = not available.

Sources: Population—International Monetary Fund, *International Financial Statistics*, midyear estimates, 1970; 1970 GDP and per capita income data—United Nations, *Yearbook of National Accounts Statistics 1971*. Ghanaian figures are for 1969. Indian data are from Central Statistical Office, *National Accounts Statistics 1960-61 - 1972-73* (New Delhi, 1975); growth rate data are simple averages of annual rates and are taken from the country studies, with the following exceptions and qualifications: Chilean and Colombian growth rates are from *Yearbook of National Accounts Statistics*; Egyptian growth rates were provided by Bent Hansen; Indian data are from *National Accounts Statistics 1960-61 - 1972-73*; South Korean growth rates are for gross national product and are from Frank, Kim, and Westphal, Table 2-4.

<sup>a</sup>Here the rate for 1950-1955 is the average for 1954 and 1955 only.

growth have varied enormously. Ghana, Chile, and India experienced so little growth that per capita incomes rose hardly at all, while Israel experienced rapid growth throughout. Other countries underwent marked changes in growth performance during this period. South Korea's growth rate averaged less than 5 percent for the 1950s, but then accelerated markedly during the 1960s, reaching 11.1 percent for the second half of the decade. Brazil's generally rapid growth decelerated abruptly in the early and middle 1960s, but rose to an even higher rate late in the decade. Colombia, the Philippines, and Turkey all had relatively satisfactory growth rates, with slower growth in the late 1950s and some acceleration in the rate in the last half of the 1960s.

## Composition of

### OUTPUT BY

Table 2-2 economic sector GDP figures w various sectors highest share of South Korea ha solute terms, In among the ten c countries in gen

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### GDP BY E

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Product, 1970

Growth Rate  
of GDP  
(per annum)

1960-65	1965-70
4.5	7.5
4.9	3.5
4.7	5.7
	4.5
3.2	2.3
2.6	4.6
10.7	7.2
6.3	11.1
5.6	6.0
4.4	7.0

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Yearbook of National  
are from Central  
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country studies, with the  
growth rates are from  
provided by Bent  
2-73; South Korean  
Westphal, Table 2-4.

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of the 1960s.

## Composition of Output and Expenditure

### OUTPUT BY SECTOR OF ORIGIN

Table 2-2 gives the percentage distribution of GDP among different economic sectors in 1960 and 1970 for each of the ten countries. Current-price GDP figures were used in order to reflect the relative importance of the various sectors in domestic economic activity.<sup>3</sup> India and Ghana have the highest share of income originating in agriculture; Brazil, Chile, Israel, and South Korea have the proportionately largest manufacturing sectors. In absolute terms, India's manufacturing sector is probably second only to Brazil's among the ten countries covered in this project, as well as among developing countries in general.

The "Other Industry" sector includes mining as well as electricity, gas, and water. The large size of that sector in Chile reflects the importance of her mineral sector. Although other countries—notably the Philippines and Turkey—have sizable mineral exports, they are not anywhere near as important in terms of domestic economic activity as is the Chilean mining sector.

As the data in Table 2-2 show, the relative importance of agriculture declined in every country included in the project except the Philippines, where expansion of agricultural output for export and relative price changes led to the opposite trend. The most remarkable shift among sectors between 1960 and 1970 occurred in South Korea, where manufacturing value added rose from 14 to 21 percent of GDP, and agricultural value added fell from 37 to 28 percent of GDP.

### GDP BY EXPENDITURE CATEGORY

Table 2-3 provides estimates of the percentage distribution of GDP by expenditure category. Although there have been year-to-year fluctuations in the pattern, the 1960 and 1970 data are fairly representative of the levels for surrounding years, and changes between those years reflect some of the trends that took place over the decade.

The ratio of private consumption to GDP fell over the decade in all countries except Brazil. The sharpest declines were in South Korea, Israel, and the Philippines. In contrast, public consumption rose as a fraction of GDP in all countries except Brazil, South Korea, and Turkey. Total consumption behavior varied from country to country, resulting in diverse trends in capital formation. There was a sharp rise in gross domestic capital formation (GDCF) in South Korea, from 11 to 26 percent of GDP, and a pronounced increase in the Philippines—from 11 to 19 percent. Increased public consumption more than offset the decreasing share of private consumption in Egypt, Ghana, and Israel, so that GDCF as a percent of GDP fell in those countries.

## PAYMENT REGIMES

Table 2-2. Sectoral Composition of GDP, Ten Countries, 1960 and 1970 (percent of total GDP in each country)

Country	Year	Sector <sup>a</sup>						
		Agriculture <sup>b</sup>	Manufacturing	Other Industry	Construction	Wholesale and Retail Trade <sup>c</sup>	Transport and Communication	Other <sup>d</sup>
Brazil	1960	25	23	2	2	12	5	31
	1969	19	28	3	2	15	6	27
Chile	1960	11	23	11	4	21	5	25
	1970	7	28	12	4	20	5	23
Colombia	1960	32	18	5	3	15	6	20
	1970	27	19	3	5	17	7	23
Egypt	1956/57	30	16		3	16	6	28
	1968/69	28	23		5	9	5	29
Ghana	1960	46	7	5	4		12	26
India	1960	47	13	2	4	9	5	20
	1969	45	13	2	4	9	5	22
Israel <sup>e</sup>	1960	12	24	4	7	11	8	35
	1970	6	24	3	6	15	9	36
South Korea	1960	37	14	3	3	13	5	24
	1970	28	21	3	6	17	6	17
Philippines	1960	31	19	2	3	13	3	28
	1970	36	19	4	2	10	3	26
Turkey	1960	42	13	2	7	8	8	21
	1970	30	16	3	8	9	9	26

Sources: United Nations, *Yearbook of National Account Statistics, 1971*, vol. III, for all countries except Egypt and Ghana. Those data are from Hansen and Nashishibi, Table I-1, and Leith, Table III-1.

<sup>a</sup>For many countries there is a statistical discrepancy between sectoral data and the estimate of GDP. U.N. figures sum to less than 100 in those cases, and they were inflated to sum to 100 for the above table. Totals do not, however, necessarily add to 100 due to rounding.

<sup>b</sup>The Ghanaian estimate of the agricultural contribution includes "local food production and distribution."

<sup>c</sup>Egyptian "Wholesale and Retail Trade" is the figure given by Hansen and Nashishibi for "Trade and Finance."

<sup>d</sup>Brazilian and Israeli "Other" sectors include all government-sector production.

<sup>e</sup>Israeli data from U.N. sources were combined with Michael's Table A-7 to provide a separate estimate for manufacturing and other industry for 1970.

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It is evid the relative im expenditures. share of outp

Table 2-3. 1960 and 19

Country	Y
Brazil	1
Chile	1
Colombia	1
Egypt	1
Ghana	1
India	1
Israel	1
South Korea	1
Philippines	1
Turkey	1

Source: United

The final two columns of Table 2-3 give exports and imports as a percent of GDP. The difference between the two reflects the *trade* balance, not the entire current account, although the magnitudes are, in general, indicative of the importance of capital flows. Three countries had capital inflows in excess of 2 to 3 percent of GDP in 1960 and 1969/70: Egypt, Israel, and South Korea. This reflects relatively sustained phenomena in these countries; donations have been important for Israel, official lending has been a major factor in Egypt, and official aid in the 1950s and private capital inflows in the 1960s were important for South Korea. Other countries also generally experienced net inflows, but they were of smaller proportions and importance than for the three mentioned above.

It is evident that the countries covered in the project vary considerably in the relative importance of exports and of the foreign trade sector in output and expenditures. Israel's exports have grown more rapidly than GDP, with their share of output rising from 17 to 28 percent. Ghana started with a very high

Table 2-3. Distribution of GDP by Expenditure Categories, Ten Countries, 1960 and 1970 (percent of GDP)

Country	Year	Consumption		Gross Domestic Capital Formation	Increase in Stocks	Exports	Imports
		Private	Public				
Brazil	1960	70	13	17	1	6	-7
	1969	72	12	16	0	8	-8
Chile	1960	75	11	15	2	14	-17
	1970	70	14	15	1	16	-16
Colombia	1960	73	6	18	2	16	-16
	1970	72	8	20	2	14	-16
Egypt	1960	68	18	15	0	19	-21
	1969	65	24	12	2	14	-18
Ghana	1960	73	10	20	2	26	-31
	1970	69	18	11	1	19	-18
India	1960	79	7	13	3	5	-8
	1969	75	9	15	1	4	-5
Israel	1960	70	19	25	2	17	-33
	1970	62	36	24	1	28	-52
South Korea	1960	85	15	11	0	3	-13
	1970	73	11	26	2	15	-25
Philippines	1960	78	8	11	2	12	-11
	1970	71	9	19	2	20	-20
Turkey	1960	74	13	15	3	4	-6
	1970	71	12	19	3	6	-9

Source: United Nations, *Yearbook of National Account Statistics, 1971*, vol. III.

For many countries there is a statistical discrepancy between sectoral data and the estimate of GDP. U.N. figures sum to less than 100 in those cases, and they were inflated to sum to 100 for the above table. Totals do not, however, necessarily add to 100 due to rounding.

<sup>b</sup>The Ghanaian estimate of the agricultural contribution includes "local food production and distribution."

<sup>c</sup>Egyptian "Wholesale and Retail Trade" is the figure given by Hansen and Nashishibi for "Trade and Finance."

<sup>d</sup>Brazilian and Israeli "Other" sectors include all government-sector production.

<sup>e</sup>Israeli data from U.N. sources were combined with Michael's Table A-7 to provide a separate estimate for manufacturing and other industry for 1970.

percent of exports—in excess of one-fourth of GDP—but that share declined, reaching 19 percent in 1970. The Philippines and South Korea experienced a remarkable increase in the importance of exports during the 1960s. In the Philippines, exports rose from 12 to 20 percent of GDP, reflecting both volume increases and large price gains for Philippine products. South Korea's performance was even more notable: her exports rose from 3 percent of GDP in 1960 to 15 percent in 1970. Brazil, India, and Turkey had relatively low and stable shares of exports in GDP over the period, and Chile and Colombia also had stable, but higher, export flows of between 14 and 16 percent in 1960 and 1970.

#### GROWTH AND COMPOSITION OF EXPORTS

Table 2-4 details some further aspects of ten countries' export structures. The first two columns give the average annual rates of growth of the dollar value of exports for the two decades of the fifties and the sixties. Exports from Israel and South Korea (in the 1960s) increased phenomenally; in their cases, dollar values provide a fairly accurate indication of volume trends because export prices changed very little. Brazil's negative average growth rate in export earnings in the 1950s reflects both declining export volumes and export price changes, and her export growth rate accelerated rapidly in the late 1960s. The high rate of growth of export earnings in Chile in the 1960s was primarily due to an increase in copper prices. Exports from Egypt and India grew only slowly throughout this period; price changes were of some importance in the 1950s and volumes did not increase significantly. Turkey's low growth rate in exports during the 1950s was exclusively a volume phenomenon, but Colombia's resulted from export price changes. The Philippine export growth rate was primarily the result of an unusually favorable set of price trends for her exports, although volume also grew during each decade. Ghana's export earning actually declined during the 1960s despite an increase of more than 50 percent in the price of her principal export, cocoa.

The third to fifth columns of Table 2-4 indicate the concentration and commodity composition of exports. The third column gives the percent of export earnings in 1970 that derived from each country's largest single export commodity. For all countries other than Israel and South Korea, the largest single exports are primary commodities—for Chile, it is copper; for the Philippines, wood; for the others, agricultural commodities. South Korea exports more textile products than any other good, and Israel's largest single export in dollar value is diamonds. Israel's export structure is far less concentrated than these data would suggest, however, because the diamonds are first imported in rough form, then cut in Israel and re-exported; net exports would include only the value added through processing of the diamonds.

Table 2-4. A  
Composition

#### Country

Brazil  
Chile<sup>a</sup>  
Colombia<sup>b</sup>  
Egypt<sup>c</sup>  
Ghana  
India<sup>d</sup>  
Israel<sup>e</sup>  
South Korea  
Philippines<sup>f</sup>  
Turkey

Sources: Internatio

<sup>a</sup>Manufactured exp  
1969.

<sup>b</sup>For Colombia t  
Manufactured exp

<sup>c</sup>Egyptian data are

<sup>d</sup>Indian data in the  
the year 1970/71.

<sup>e</sup>Israel's largest exp  
less importance in

<sup>f</sup>The "percent man  
the largest ten com

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Table 2-4. Average Annual Rate of Export Growth, by Decades, 1950-1970, and Composition of Exports, 1970, Ten Countries

Country	Average Annual Rate of Growth of Exports (dollar value)		Composition of Exports, 1970 (percent of total dollar value)		
	1950-60	1960-70	Largest Export	Three Largest Exports	Manufactured Exports
Brazil	-5	8.0	34.2	47.5	11.2
Chile <sup>a</sup>	5.7	9.8	75.8	84.3	10.5
Colombia <sup>b</sup>	1.6	4.6	60.8	65.4	10.6
Egypt <sup>c</sup>	1.0	3.1	44.8	80.8	38.8
Ghana	4.4	-3.0	68.0	80.2	7.4
India <sup>d</sup>	1.5	4.2	12.4	27.0	14.7
Israel <sup>e</sup>	20.0	13.6	31.7	56.7	76.9
South Korea	1.7	41.7	21.3	40.5	83.6
Philippines <sup>f</sup>	5.4	6.6	23.5	61.4	17.3
Turkey	2.5	5.8	25.6	55.4	14.3

Sources: International Monetary Fund, *International Financial Statistics*, and country studies.

<sup>a</sup>Manufactured exports for Chile are for 1965, and the shares of largest and three largest are for 1969.

<sup>b</sup>For Colombia there are only two major exports; all others are treated as "minor." Manufactured export percentage was taken from Díaz-Alejandro, Table II-3.

<sup>c</sup>Egyptian data are for 1968.

<sup>d</sup>Indian data in the first three columns are from Bhagwati and Srinivasan, Table 9-1, and are for the year 1970/71.

<sup>e</sup>Israel's largest export is diamonds, which are imported, cut, and re-exported; they are of much less importance in terms of value added.

<sup>f</sup>The "percent manufactured" figure for the Philippines is "minor exports" and includes all but the largest ten commodity exports given in Baldwin, Table 1-3.

The fourth column of the table gives the percent of export value derived from the three largest exports in 1970. In most cases the relative importance of the additional commodities is not great. Chile, Colombia, and Ghana are all heavily dependent on a single primary export. All of Egypt's principal exports are cotton-related, and Egypt should therefore be regarded as a fourth country with heavy reliance on a single commodity. Brazil was greatly dependent on coffee export earnings during the 1950s, but the growth of other exports has reduced considerably the share of coffee in total exports. In the Philippines and Turkey, exports are less concentrated in that several are of approximately equal importance: for Turkey, tobacco and cotton are equally predominant, and for the Philippines, wood and coconut products are of approximately the

at share declined, sea experienced a he 1960s. In the reflecting both s. South Korea's percent of GDP relatively low and d Colombia also cent in 1960 and

es' export struc- of growth of the d the sixties. Ex- phenomenally; in of volume trends rage growth rate volumes and ex- apidly in the late in the 1960s was Egypt and India of some impor- y. Turkey's low ne phenomenon, hilippine export able set of price g each decade. spite an increase cocoa.

centration and ne percent of ex- est single export orea, the largest ; for the Philip- n Korea exports single export in ncentrated than first imported in uld include only

same importance, with sugar and copper not very far behind. India, Israel, and South Korea also have relatively diverse export structures.

The final column in Table 2-4 gives the percentage of export earnings originating in manufactured products. By 1970 Israeli and South Korean exports were predominantly manufactured products, and Egypt exported cotton textiles. In all other countries manufactured exports were a relatively small fraction of total exports.

### Growth Strategies

These data provide only a few indicators of the characteristics and growth of each of the countries. They do not yield any insights into the policies and conditions that generated the economic performance of the individual countries. Insofar as trade and payments policies and their interaction with growth are central themes in this volume, a short characterization of the basic outlines of growth policy in each of the ten countries will provide useful background.<sup>4</sup>

In all ten countries the stated objectives of the government included a great deal of emphasis on economic growth. For Israel and Egypt, defense considerations were accorded greater priority, and the governments of both Egypt and India seem to have attached somewhat greater importance to equalizing income distribution than did the others; however, these countries adhered to the growth objective as well. In every case rapid growth was a stated objective of policy. In most countries development plans were drawn up, and national debates about growth strategies centered around these plans.

In virtually all of the countries, rapid growth was equated with industrialization. Emphasis was usually placed on encouraging those industries that could produce goods currently being imported. In many cases industrialization strategies shifted over time. At one extreme, India and Turkey, throughout the period covered by the country studies, consistently chose an import-substitution strategy to foster industrial development. While balance-of-payments considerations often led to import restrictions even more severe than would have been employed to achieve industrialization, there can be little doubt that import substitution would have predominated in any event. Chile, Ghana, and the Philippines heavily protected import-substitution activities, although probably to a smaller extent than India and Turkey. Egypt also seems to have had a consistent, but milder, bias toward import substitution.

No country covered in the project relied on an export-promotion strategy throughout. However, in Brazil after 1968, in South Korea after about 1961, and in Israel after 1962, an earlier strategy of import substitution was replaced by a shift toward export promotion. To a lesser extent Colombia also shifted away from import substitution after 1967 and began to encourage the growth of nontraditional exports. The export-promotion policies of Brazil and South

Korea probably policies of India to a lesser degree

### Rates of Inflation

Although the nature of changes on the role of changes—are of regime. Table 2-5 shows ten countries. See Table 2-5 observed decade.<sup>5</sup> The 1960-1970, for annually in the first 1960s.

Despite year reasonably accurate considerable differences had relatively low sharply. Brazil, tion well above

Table 2-5. Brazil

Country	1960-1970
Brazil	4
Chile	3
Colombia	3
Egypt	8
Ghana	6
India	8
Israel	2
South Korea	7
Philippines	7
Turkey	3

Source: International

<sup>a</sup>For Ghana and Israel does not cover both

<sup>b</sup>Prices are annual

India, Israel, Korea probably represent the opposite extreme from the import-substitution policies of India and Turkey. Israel and Colombia were biased toward exports to a lesser degree.

### Rates of Inflation

Although the nature of the exchange control regime has a significant influence on the role of the exchange rate, monetary factors—especially price level changes—are of great importance under any type of trade and payments regime. Table 2-5 provides basic data on the behavior of the price level for the ten countries. Some of the ten-year averages shown in the last two columns of Table 2-5 obscure wide fluctuations in the rate of inflation within each decade.<sup>5</sup> The average annual Brazilian inflation rate of 39 percent for 1960-1970, for example, is the result of inflation in excess of 50 percent annually in the first half of the decade, and rates of around 20 percent in the late 1960s.

Despite year-to-year fluctuations, the data in Table 2-5 provide a reasonably accurate reflection of the experience of the ten countries. There is considerable diversity among them. Egypt, India, and the Philippines have had relatively low rates of inflation, but each has had periods when prices rose sharply. Brazil, Chile, and South Korea have experienced annual rates of inflation well above 10 percent throughout the 1950 to 1970 period, although South

Table 2-5. Behavior of Wholesale Prices, Ten Countries, 1950-1970

Country	Wholesale Price Index (1963 = 100) <sup>a</sup>					Average Annual Percentage Increase <sup>b</sup>	
	1950	1955	1960	1965	1970	1950-1960	1960-1970
Brazil	4	10	27	289	739	21	39
Chile	3	15	60	187	666	35	27
Colombia	33	40	72	127	195	8	10
Egypt	82	84	100	112	133	2	3
Ghana	66	76	82	141	167	2	7
India	82	69	93	119	166	1	6
Israel	26	66	80	113	138	10	6
South Korea	1	41	67	148	216	45	12
Philippines	75	70	83	107	145	1	6
Turkey	34	44	88	109	145	10	5

Source: International Monetary Fund, *International Financial Statistics*, line 63.

<sup>a</sup>For Ghana and Israel, indexes are the consumer price index, since the wholesale price index does not cover both decades.

<sup>b</sup>Prices are annual averages of monthly observations.

Korea's inflation rate fell in the late 1960s. Colombia, Israel, and Turkey have had a moderate degree of inflation; Israel and Turkey were able to reduce their rate of inflation in the 1960s from what it had been in the 1950s. India, the Philippines, and Ghana appear to have had relatively little inflation in the 1950s, but experienced more in the 1960s. All of the project countries had accelerating rates of inflation in the early 1970s.

For all of the project countries except Egypt, inflation during the 1960s was sufficiently in excess of the rate among the developed countries so that—on that score alone—balance-of-payments difficulties would probably have been encountered had exchange rates not been altered.<sup>6</sup> This phenomenon is of great importance in understanding the outcomes of endeavors to alter the nature of the trade and payments regime.

## II. DELINEATION OF THE PHASES

In principle there is no limit to the variety of alternate trade and payments regimes that might be adopted to balance foreign exchange expenditures and receipts. Regimes that do not systematically employ quantitative restrictions may use some combination of tariffs and taxes on current account transactions and even occasional quantitative restrictions; capital account transactions are almost always subject to some general limitations.

For exchange control regimes, the situation is even more complex. Even a physically constant import quota implies changes over time in the implicit or explicit value of import licenses accruing to license recipients. It would be a rare occurrence indeed for an exchange control authority to alter physical allocations so that the restrictionist content and structure of the regime remained unaltered, even if that were the desired goal. But much more than that is involved. A great variety of instruments may be employed in administering QR regimes, including:

Guarantee deposits, varying in amount for different categories of import licenses.<sup>7</sup>

Tariffs and surcharges.

Licenses for different categories of imports allocated by different criteria and procedures.

Prohibited lists, free lists, and special exemptions.

Regulation and licensing of exports.

Various incentives, sometimes project-specific, to encourage private capital inflows.

Restrictions on the repatriation of profits and dividends of foreign-owned firms.

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- Import replenishment schemes applying to some exports.
- Rebates on import duties for exports.
- Rights granted to exporters to resell part of their foreign exchange earnings.
- Special regimes for government enterprises.
- Multiple exchange rates, including special tourist rates, export subsidies, and special import categories subject to exchange auction.
- Subsidies for capital goods imports.
- Low-interest loans for certain classes of transactions.

Since most of these instruments can be employed at many different quantitative levels, the variation in exchange control regimes is infinite, and no two are identical in form or substance.

Even though each regime has its own unique features, treating each as inherently different from every other would defeat analysis of the results from the individual country studies; some unifying form of classification or aggregation is necessary. Such a scheme was set out in the analytical framework developed for this project. Five different phases of trade and payments regimes were distinguished; this distinction provided a basis on which country authors could conveniently characterize regimes and trace shifts from one type of regime to another.

The basic principle of classification underlying the five phases is the extent to which a country relies on quantitative—as opposed to price—measures as a means of regulating its trade and payments.<sup>8</sup> Among the instruments listed above, some were quantitative controls, such as import licenses, while others were price interventions, such as export subsidies, multiple exchange rates, and low-interest loans. Every trade and payments regime combines both types, but the relative importance attached to each varies. The phases, described in more detail below, go from heavy reliance on quantitative restrictions (Phase I) to exclusive use of price interventions (Phase V). The phases between are hybrids: Phase II is a system of quantitative restrictions within which price measures are also employed; a Phase IV system may employ quantitative restrictions but places relatively greater reliance on pricing instruments; Phase III is defined as a period of transition from reliance on quantitative restrictions to greater use of pricing interventions.

It should be noted that no necessary chronological sequence is implied by the numbering of the phases. Indeed, it was suggested in the analytical framework that countries are often in Phase V (reliance almost exclusively on the exchange rate and other price interventions, including macroeconomic policy, to regulate the balance of payments) when a crisis arises due to internal or external disturbances; one possible reaction would be to impose across-the-board quantitative restrictions on imports (Phase I) in an effort to cope with

the crisis.<sup>9</sup> In other cases countries might be in a Phase II regime, devalue their currencies (Phase III), and then return to a reliance on quantitative restrictions (Phase I or II, depending on the nature of the regime).

Obviously when trade and payments regimes are constantly changing in greater or lesser degree, the delineation of phases has an arbitrary element, as does any aggregation scheme. On the whole, however, the categorization proves useful. Detailed descriptions of the phases are given below; the section following describes the experience of each country with its trade and payments regime.

### Phase I

Phase I is characterized by the imposition or sharp intensification of relatively undifferentiated—or across-the-board—controls. It might start from any of the other phases in response to a potential and unsustainable payments deficit resulting from intense or sustained domestic inflationary pressure or from a sharp drop in world prices for some major exports, as in the Great Depression or in 1952/53. Reasons for instituting controls are of interest in understanding the nature of the regime, but they are not critical to the definition of Phase I.

Throughout Phase I, controls are generally maintained or intensified. They might be maintained simply because of the need to continue offsetting excess demand for imports at an overvalued exchange rate. Their severity might be increased because of any of several interrelated factors: (1) the initial controls might fail to correct sufficiently the unsustainable payments deficit; (2) the initial set of controls might result in evasions of the system, thus reducing the deficit by an amount less than anticipated; (3) once the new instruments are instituted, policymakers may find them handy for a variety of other purposes as an administratively “easy” device; and (4) policymakers may perceive their actions to be freed from a balance-of-payments constraint and adopt policies that in fact require additional restrictiveness to offset further adverse effects on the balance of payments.

Phase I decisionmaking and policies may perhaps be characterized as “undifferentiated” to a greater extent than in other phases. Quantitative restrictions are applied with relatively few rules, and treatment of competing claims to import licenses tends to be relatively uniform. Rules for license allocation tend to be of an across-the-board nature, such as allocating licenses as a specified fraction of the applicant’s base-year imports or allotting licenses pro rata with applications.

### Phase II

Phase II is characterized by continued reliance upon quantitative restrictions and, indeed, generally increased restrictiveness of the entire control system.

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However, two additional and related aspects of the QR system—both relatively unimportant during Phase I—become significant in Phase II: the detailed workings of the control system become increasingly complex and specific, and price measures are adopted to buttress the functioning of the quantitative control system. The imposition of price measures, such as duties and taxes on imports and subsidies to exports, implies that the de facto, or implicit, price of foreign exchange is above the parity rate. The primary reliance upon quantitative restrictions in Phase II generally indicates that—even with implicit exchange rates above the official exchange rate for various categories of goods—there is excess demand for foreign exchange at those rates.<sup>10</sup>

The complexity of Phase II stems from dissatisfaction with the results of an undifferentiated system. It generally is the result of many small decisions, rather than an overall policy design. Thus, one hallmark of Phase II is the increasing proliferation of detailed regulations governing various aspects of the exchange control regime. Many factors contribute to the increased complexity of the regime. The initial, undifferentiated licensing rules are not related to planners' and policymakers' priorities; plants close because they lack spare parts, and inadequate supplies of raw materials slow down production. "Priorities" are therefore established to attempt to maintain flows of intermediate imports, capital goods, and occasionally even "essential" consumer goods. Imports are distinguished according to destination, between actual users and wholesalers; according to type—capital goods, intermediate goods, or consumer goods; according to the "priority" status of the using industry; and so on.

With each increase in the number of categories the number of rules and regulations surrounding the classification of imports into those categories mounts, both as a matter of policy and to protect bureaucrats from allegations of favoritism. Simultaneously, controls over exports and other foreign exchange transactions are differentiated. At the policy level, cabinet officers and other high-level decisionmakers feel they are losing control over the results of the quantitative restriction regime and attempt to regain it by imposing new regulations. Bureaucrats, meanwhile, must make increasingly fine individual decisions and adopt additional rules to protect themselves from allegations of arbitrary behavior.

Since virtually every government ministry becomes involved in one or more aspects of the decisionmaking process, decisionmaking becomes highly fragmented and often internally inconsistent. Thus, a ministry of agriculture may attempt to increase fertilizer or tractor imports to encourage agricultural production, while a ministry of industries is trying to reduce imports of those same goods to encourage domestic production.

The various levels at which these conflicts can occur are well documented in the country studies. Allocation of import licenses among categories, products, and users results in intense competition among conflicting interests at

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all levels: private sector versus public sector, wholesalers versus industrialists, region versus region, and so on. Efforts to decide among conflicting claims are, of necessity, subject to question, and questions and criticism abound. The more bureaucrats try to protect themselves by adopting additional rules, the more the question of which rule applies becomes paramount, and the more scope there is for internal inconsistency, for administrative discretion, and for favoritism and outright corruption.

The second characteristic of Phase II is the resort to price measures to supplement the QR regime. This generally occurs with respect to both exports and imports. The continuation or intensification of the "foreign exchange shortage" inspires measures to increase export earnings. Like the quantitative restrictions discussed above, export incentives tend to be adopted in a piecemeal and fragmented fashion. Rebate schemes, "import replenishment" schemes, special credits for exporters, and a variety of other devices may be instituted to offset part or all of the discrimination against exports that is implicit in an overvalued exchange rate.

Price measures are also adopted to absorb part of the excess demand for imports. Tariffs may be raised, surcharges added to the cost of importing, and guarantee deposits are generally required on various categories of imports. These and other measures tend to reduce—at least temporarily—the windfall gain, or premium, accruing to the recipients of import licenses. Premium-absorbing charges against imports are changed frequently and, indeed, small and frequent changes are an integral part of Phase II. For this reason, characterizing a Phase II regime at a particular moment in time is extremely difficult and will fail to capture fully the nature of that regime.

### Phase III

As defined here, Phase III usually starts with a formal parity change in exchange rates to reflect the de facto price of foreign exchange. This is accompanied by removal of some of the detailed regulations and a reduction in the multiplicity of rates found in Phase II. Because of these changes the increase in the effective price of foreign exchange is smaller than the increase in the parity rate. It is possible that the removal of export incentives and import surcharges may, in fact, leave the effective exchange rate unaltered, and in many instances there may be negligible or even negative devaluation for some categories of goods.

Removal or simplification of the import surcharges and export incentives that were previously in effect results in smaller variance in the implicit effective exchange rates and in the protection accorded various activities. Greater uniformity of effective exchange rates and a parity change are integral aspects of this phase. It may also have other features, including partial or extensive

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removal of QRs, alteration of tariff schedules, and restructuring of public finance, monetary management, and external debt. Thus, Phase III episodes can begin with a wide range of actions. They may involve only adjustments—a replacement of tariffs, taxes, and subsidies by the altered official exchange rate, with continued reliance upon QRs—or may involve major restructuring of the trade and payments regime, with a significant change in the effective exchange rate and an alteration in the nature of the QR regime.

Phase III continues until the initial readjustment of the economy to the altered structure of incentives is effected. In the case of a simple tidying-up operation, it may be of very short duration. In other cases Phase III may last for several years if the massive change in relative prices set off by a devaluation-and-liberalization<sup>11</sup> package leads to a slow internal readjustment within the economy. Detailed consideration of the ten countries' experience with Phase III episodes is the subject of Part II of this volume and is evaluated at length there.

#### Phase IV

Phase IV features greater emphasis on price mechanisms than on quantitative restrictions in managing the balance of payments. It usually follows in response to the Phase III change in the foreign exchange regime, if the volume of export earnings (and other current account sales to foreigners) starts increasing at an acceptable rate, or if demand for imports declines at the higher price of foreign exchange, or if speculation against the currency abates after devaluation. It can also occur because of favorable exogenous events, such as improved terms of trade or an increased flow of private foreign investment and aid.

When foreign exchange availability grows at least as rapidly as the demand for foreign exchange, there is no need for additional quantitative restrictions or for increased restrictiveness of existing controls for purposes of managing the balance of payments. Thus the implicit premiums on import licenses are not increasing. If foreign exchange receipts grow rapidly enough, then the restrictionist content of the trade and payments regime can be reduced, either by removing QRs or by liberalizing import licensing practices. The net result is increased reliance upon the price mechanism for the allocation of foreign exchange and a reduced burden for quantitative controls.

Phase IV continues as long as reliance on QRs is unchanged or diminishing. If a reappearance of payments difficulties should be met by tightening QRs, the Phase IV regime may be replaced by a Phase I or II system. If QRs are abandoned as a device for allocating scarce foreign exchange,<sup>12</sup> the country is said to be in Phase V.

**Phase V**

Phase V is a period during which an exchange regime is fully liberalized, in the sense that there is virtually full convertibility on current account, and quantitative restrictions are not employed as a means of regulating the balance of payments. Thus an economy in Phase V is not an exchange control regime in the accepted sense of the term, and Phase V represents an alternative to the QR regimes. For Phase V to continue, the growth of foreign exchange receipts must approximately equal the growth of demand for foreign exchange. This is accomplished because the price of foreign exchange is sufficiently high or because monetary and fiscal policies are employed as the instruments to achieve payments balance.

**III. PHASES IN THE PROJECT COUNTRIES****Phases in Each Country**

The characterization of the five phases is necessarily somewhat arbitrary, and pinpointing the precise date at which a country shifted from one phase to another is—with the possible exception of the start of Phase III—extremely difficult.<sup>13</sup> Nonetheless, country authors used the phase schematic to classify country experiences, and that classification provides a means of briefly reviewing the experience of each country and of comparing it with others. The reader may find references to Figure 2-1 helpful in following the discussion.

**BRAZIL**

Brazil's relatively liberal payments regime of the immediate postwar years was short-lived. Internal inflation at a fixed nominal exchange rate resulted in unsustainable payments deficits once the reserves built up during World War II had been exhausted. By 1950, Brazil was in Phase I. The abrupt decline in coffee prices in 1953 put even more pressure on the regime, and the country adopted numerous measures designed to reduce further the flow of imports and to support the domestic goal of import substitution.

From 1953 to 1963 Brazil was in Phase II, interrupted by two short-lived Phase III episodes in 1957 and 1961. Multiple exchange rates and quantitative restrictions were used to allocate foreign exchange, although there was increasing emphasis on the pricing mechanism as the period progressed. The most salient characteristic of this period was the decline in export earnings. There was a large and increasing differential incentive toward the production of import substitutes through the first half of the period, and the real effective exchange rate (EER) for exports declined drastically until 1957. The Phase III

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episodes of 1957 and 1961 appear to have prevented further depression of the real EER for exports. Despite these and other measures, nothing appeared to stimulate export earnings, and they continued to fall—with sporadic fluctuations—through 1963.

In 1964 Brazil undertook a devaluation and stabilization program that was much more far-reaching than earlier attempts had been. Several years of Phase III readjustment followed, and Phase IV cannot be said to have commenced until 1968. Since 1968 Brazil has increasingly liberalized her regime, and the restrictionist content of the vestiges of exchange control has greatly diminished.

Brazil therefore appears to offer two distinct sequences of stages: a cycling back and forth between Phase II and abortive Phase III episodes during the 1953-1963 period, and then a prolonged Phase III followed by Phase IV in the late 1960s and early 1970s.

#### CHILE

The Great Depression had a severe impact on Chile, and quantitative restrictions were adopted in the 1930s in response to it. As documented by Behrman, Chile was in Phase II continuously from the 1930s to 1956. The entire period was characterized by de facto multiple exchange rates, quantitative restrictions, and continuous alterations of the regime. The nominal exchange rate was constant for more than twenty years despite a rate of inflation substantially in excess of the world rate, but exchange rates applying to individual foreign exchange transaction categories were altered frequently. The Chilean escudo was increasingly overvalued during this interval, and exports and imports fell sharply relative to GDP. The restrictiveness of the regime increased almost constantly.

Chile's first postwar attempt at "stabilization" came in 1956 and was motivated more by the desire to correct internal economic instability—especially rapid inflation—than by events in the external sector. The Phase III episode begun in 1956 included a massive devaluation and the elimination of several exchange rate categories. It thus represented a sizable move toward unified rates and liberalization of the import regime. Nonetheless the exchange rate was still overvalued. Within two years the entire program was running into difficulties, as accelerated internal inflation, declining foreign copper prices, and mounting debt-service obligations put pressure on the balance of payments, while the overvalued exchange rate still encouraged imports and discouraged exports.

A renewed effort at controlling the rate of inflation was made under a new government, elected in 1958. This government, believing that capital inflows and foreign competition could help in attaining its domestic goals,<sup>14</sup> devalued the escudo again (and, again, by an insufficient amount), in January

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1959, further unified exchange rates, and followed a policy of extensive liberalization. Imports increased sharply as the combined result of liberalization and continued overvaluation, and at the end of 1961 a balance-of-payments crisis forced a reversion to Phase II quantitative restrictions and multiple exchange rates. Prior deposit requirements, initially set at 10,000 percent, were a major regulatory instrument, as was a "prohibited" list of imports. The net result was a regime more restrictive than at any time since 1955, before the first devaluation and liberalization attempt.

An election late in 1964 brought to power yet another government, which again attempted to liberalize the regime. This was the period during which Chile had a sliding peg, with devaluations of about 1 percent announced every 15 to 20 days. The regime became increasingly liberal, although the exchange rate remained overvalued, and export earnings grew—mostly because of high copper prices. Behrman calls the entire period Phase III. It ended when the Allende government was elected in 1970, and Phase II quantitative restrictions were again adopted.

Chile's trade and payments regime has been subject to continual alteration over time. In general Chile represents a rapid-inflation country in which quantitative restrictions and a Phase II regime have dominated. The frequent efforts to alter the regime have not been very thoroughgoing or long lasting; these Phase III efforts are extensively analyzed in Part II of this volume. Chile's experience with the sliding peg is particularly useful in analyzing some of the factors involved in devaluation-cum-liberalization efforts in rapid-inflation countries.

#### COLOMBIA

As in Chile, the Great Depression brought exchange control to Colombia. Controls were never totally relaxed thereafter, although there were successive and frequent changes in the payments regime over the postwar years.

The peso became increasingly overvalued during the 1940s as the nominal exchange rate was held constant. Accumulated foreign exchange reserves enabled Colombia to maintain a moderately liberal regime until the end of 1950, at which time a large payments deficit emerged. In 1951 Colombia's first liberalization episode was launched with a devaluation of 27 percent. Supported by rapidly rising coffee prices, the liberalization continued into 1954, when the prohibited list of imports was abolished. At the end of that same year, however, mounting imports, declining coffee prices, and accumulating debt-service obligations led to an abrupt reversal, and Phase II quantitative restrictions were reinstated. Restrictions intensified continuously until early 1957, but imports continued to mount.

In April of 1957 the adoption of a "stabilization program" initiated another Phase III episode—a simplification of the multiple exchange rate

system that had been averaging 21 percent per year, the real exchange rate during the period.

Although the 1955/56 level, the balance-of-payments once again restrictions increased in 1962. Devaluations accompanying increasingly tight controls undertaken, and imports had been fixed.

Increasing controls were imposed. The liberalization regime was altered. The devaluation, was adopted. Although quantitative restrictions has gradually

Colombia's devaluation-cum-liberalization change rates accompanied by a short-lived liberalization mid-1968 Colombia

#### EGYPT

Egypt's trade regime largely by the fact that it was not fully converted to a free trade regime by the Korean War but was liberalized. When the V trade regime was

General imports were not portable from the regime in which Egypt had become increasingly liberalized. It entered Phase II

system that had developed and a devaluation. Rapid domestic inflation, averaging 21 percent annually in 1957 and 1958, eroded part of the increase in the real exchange rate,<sup>15</sup> and import restrictions continued to be tight over that period.

Although imports during 1957 and 1958 were one-third below their 1955/56 level, they began increasing in 1959, after "austerity" had brought the balance-of-payments situation under control. In 1961, when increasing imports once again brought severe balance-of-payments difficulties, import restrictions increased, and all import licensing was suspended in November 1962. Devaluation was announced later in the same month, with no other accompanying actions; import licensing resumed a month later and became increasingly tighter until 1965. In June of that year a devaluation was again undertaken, and the regime was again liberalized; by mid-1966 virtually all imports had been freed from licensing requirements.

Increasing imports again led to payments pressures, and tight import controls were imposed in the fall of 1966. Rather than repeating earlier devaluation-liberation attempts, however, the Colombian trade and payments regime was altered in March 1967. A sliding peg, with small, frequent devaluations, was adopted. Liberalization started gradually and haltingly in late 1967, was increasing fairly systematically by 1969, and has continued since. Although quantitative restrictions remain an important part of the system, their relative importance as a means of controlling Colombia's payments situations has gradually diminished since the late 1960s.

Colombia has experienced many exchange rate changes and five devaluation-cum-liberalization episodes since 1950. She has had multiple exchange rates combined with quantitative restrictions, a devaluation accompanied by a sharp cutback in imports, two devaluations followed by short-lived liberalization, and finally has established the crawling peg. Since mid-1968 Colombia has been in Phase IV.

#### EGYPT

Egypt's trade regime immediately after World War II was conditioned largely by the fact that her accumulated reserves were held in sterling and were not fully convertible. Supported by the rising cotton prices accompanying the Korean War boom in 1950, the trade and payments regime was greatly liberalized. When cotton prices fell in the latter part of 1951, the liberal Phase V trade regime also ended.

General import licensing started in late 1951; only "necessities" were importable from the sterling area, but licenses for imports from countries with which Egypt had bilateral agreements were freely available. The system became increasingly complex, and Egypt can be characterized as having entered Phase II by 1952. Import entitlement schemes were introduced in that

year, and bilateral trading arrangements increased. In 1955, entitlements were abolished and replaced with a uniform surcharge on imports and a premium on cotton exports; simultaneously, quantitative restrictions were tightened.

With the Suez War of 1956 the orientation of Egypt's trade shifted toward Eastern Europe and the Soviet Union. Foreign exchange budgets, allotted on a quarterly basis, were established in 1957; a generalized export premium system was introduced, and import surcharges were increased. Another partial de facto devaluation came in 1959, and Egypt remained in Phase II throughout the period.

In 1961 the government nationalized all large companies, and the import and export trade became government monopolies. The phase system of classification outlined above does not fit the Egyptian experience after that date, though there was a devaluation episode in 1962 which was little more than window dressing.

#### GHANA

Ghana had a liberal, Phase V, regime until the end of 1961. Prior to that date the country had foreign payments regulations in accordance with regulations for sterling area currencies. Reserves, which had accumulated during the Korean War boom, were gradually run down until 1957, when Ghana became independent. After that date the rate of depletion increased markedly.

By 1961, reserves had been virtually exhausted, and controls were quickly imposed. A variety of instruments was employed, and after the initial shakedown of the system, corruption in import licensing became a massive problem. As Leith documented, late 1963 marked the beginning of Phase II, as "changes in regulations were frequent in a frantic attempt to patch up a system that had one big hole in it: the corrupt and erratic issue of import licenses. . . ."<sup>16</sup>

From 1964 to 1966, attempts were constantly made to alter the system, but imports rose sharply and short-term debt and payments arrears mounted rapidly. After the overthrow of the Nkrumah government in 1966, the National Liberation Council embarked upon a "stabilization program." This marked the start of Phase III. The program included restrictive monetary and fiscal policies, tighter import control, and rescheduling of short-term debt. This was followed in July 1967 by a major devaluation. Ghana is thus the only country whose devaluation marked the end, rather than the beginning, of Phase III. Leith marks July 1967 as the date of entry into Phase IV, and import liberalization gradually increased after that time.

By 1971, however, the payments deficit was again unsustainable, and the government chose to devalue by 80 percent. During this same year a military government assumed power—apparently with popular support. It partially rescinded the devaluation and abandoned the liberalization. Thus Ghana returned to Phase I.

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Unlike the Latin American countries, Ghana has had a relatively low rate of inflation. Changes in the price level at a fixed exchange rate have not been a major problem, but management of demand and aggregate terms-of-trade changes have been. Ghana thus provides a case of a country that had two devaluations, or Phase III, episodes. The first was followed by liberalization, the second by increasing restrictiveness of the regime; the second, however, is too recent to permit full analysis.

#### INDIA

India entered her first Five Year Plan in 1951 with relatively modest targets and with large reserves of sterling balances accumulated during World War II. Although considerable attention was devoted to the goals of industrialization and import substitution, her trade and payments regime remained quite liberal. Such restrictions as existed were not imposed for balance-of-payments reasons. Heavy import demands, resulting from the start of the Second Plan and a boom in private investment, led to an abrupt reversal of India's balance-of-payments situation. Reserves were rapidly exhausted, and Phase I began in 1956 with the imposition of severely restrictive import licensing. India entered Phase II in 1962 as the trade and payments regime became increasingly ad hoc, categories of imports multiplied, and export subsidies and import surcharges developed.

The restrictive content of the Indian payments regime remained high until 1966. Among the ten study countries, India had one of the most restrictive trade regimes. In 1966 a gross devaluation of 57.6 percent along with liberalization of imports started India's only Phase III episode. For a variety of reasons the devaluation and liberalization episode was followed by a recession, which lasted into 1968. As recovery started, import demand rose sharply, and India quickly reentered—and has remained in—Phase II.

India is an instance of a country that has relied predominantly on QRs continuously since the late 1950s. Her one devaluation episode was half-hearted at best. It did not bring any lasting relief from Phase II controls, except in the sense that restrictions might otherwise have been more severe than they in fact were.

#### ISRAEL

Israel is the one country included in the project whose economic history since 1952 shows an almost uninterrupted movement from Phase I to Phase V. Starting with rigid import controls in 1948, Israel was in a Phase I regime until 1952, as the new country's resources were absorbed by the inflow of immigrants. That phase saw across-the-board rationing, physical allocations of both domestic goods and imports, and price controls, which obscured the extent of excess demand within the economy.

The period from 1952 to 1955 saw a shift from Phase I controls to Phase III. With almost no intervening Phase II situation, the currency was devalued and the regime rationalized. By 1955 Israel emerged with a much more liberal regime and was in Phase IV. Although QRs were still employed, they were diminishing in importance relative to price measures. Effective exchange rates at least kept pace with domestic inflation, and export growth was rapid. Michaely chose to call the 1955-1961 period Phase IV-A.

There was another devaluation in February 1962, with simultaneous removal of preexisting export subsidies and an announcement that quantitative restrictions would be replaced by price incentives. Michaely denotes this as the start of Phase IV-B because liberalization continued, although somewhat more slowly than planned.<sup>17</sup> By 1969, Michaely places Israel in Phase V; exchange rate alterations and other price measures were used to regulate the balance-of-payments situation, and current account transactions were largely free of quantitative controls.

Israel represents a country whose experience with quantitative restrictions consists almost entirely of an effort to dismantle them. The entire period after 1952 was characterized by diminishing reliance upon QRs. The movement from severe QRs to a relatively free current account was accompanied by rapid export growth. After the late 1950s, export incentives were used, between devaluations, to maintain the real exchange rate for export earnings.

#### SOUTH KOREA

After World War II Korea was partitioned, and her normal trade flows were disrupted. South Korea was thus confronted with the problems of reconstruction both from the war and from partition. Quantitative controls were immediately employed, and South Korea was in Phase I from that time until the end of the Korean War in 1953. The government was heavily involved in foreign transactions during that period, and a bewildering variety of exchange rates was in force.

From 1953 until the end of 1960, South Korea was in Phase II. That was a period of increasingly sophisticated control mechanisms. Complicated procedures were used to assist barter trade and to facilitate imports in the face of a large current account deficit sustained by aid inflows.

The periods 1961/62 and 1964/65 represent two distinct Phase III episodes. There was a massive devaluation in 1961, accompanied by an attempt to unify exchange rates and liberalize the trade and payments regime. A revolution in 1961 ended with assumption of power by the military. This government's expansionary fiscal policies, combined with a poor crop, resulted in excess demand, and in 1963 rapid inflation forced a return to Phase II, with multiple exchange rates and stringent controls on trade.

The second Phase III, in 1964/65, was much more successful. There was an initial devaluation of about 50 percent in May of 1964. In late 1965

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domestic interest rates were raised substantially in a major monetary reform; tax administration was also reformed. During this period also, the multiple exchange rate system was unified, and trade restrictions were eased.

The period from 1966 until August 1972 can be characterized as Phase IV. South Korea's regime has continued to be fairly liberal compared with earlier years, although some quantitative restrictions are still in effect. Several attempts were made to complete the liberalization of the trade and payments regime, but these efforts never came to fruition.

In August 1972, in an effort to achieve greater price stability, a new set of reforms was announced. The exchange rate was again devalued, and export incentives were reduced. These reforms occurred after the research for the Frank, Kim, and Westphal study of South Korea was completed, and they are not covered in this volume.

The South Korean experience is interesting in a number of regards. South Korea's export growth has been phenomenal, as has been the growth rate of real GNP. A natural and important question is the role of trade and payments policies in that growth performance. South Korea also represents a country where the rate of domestic inflation has been relatively high. Management of the exchange rate under those conditions is also relevant in analyzing alternative trade and payments regimes. Finally, the South Korean monetary reforms of 1964/65 provide a basis for analyzing the relationship of the domestic and monetary sector and foreign trade policies.

#### THE PHILIPPINES

The postwar reconstruction period in the Philippines was one of relatively rapid growth. Exchange control was introduced in 1949 in response to balance-of-payments pressures. The Philippines remained in Phase I until about 1955.

As documented by Baldwin, Phase II began in the mid-1950s amidst mounting opposition to quantitative restrictions. Partial ad hoc measures were adopted to offset some of these undesired results of the QR system, and Phase II continued until April 1960. At that time multiple exchange rates were introduced, and a Phase III effort at formal liberalization began. Restrictive monetary and fiscal policy was part of the liberalization package. Phase III ended early in 1962, when a floating exchange rate was adopted and most controls were removed. By the end of 1965, all forms of exchange control had been lifted, and the Philippines was in Phase V with a fully liberalized regime at a fixed exchange rate.

Although growth rates were satisfactory, balance-of-payments pressures reemerged by 1967, and controls were reintroduced. Although they were relatively moderate contrasted with those of the late 1950s and early 1960s, the controls nonetheless represented a shift to Phase I. In spite of these restrictions, another exchange crisis developed late in 1969 in response to a highly expansionary government budget. The following February, the government

decided to float the exchange rate and to remove controls, thus reentering Phase III.

The following years were ones of continued liberalization, and the economy was in Phase IV by 1971—the terminal year of the Philippine study—and has continued in that regime. Thus the Philippines has had two periods of quantitative restrictions—the second shorter-lived and less restrictive than the first. Each period has ended with the adoption of floating exchange rates (although inflation has been moderate) and with fairly rapid decontrol and liberalization.

#### TURKEY

Turkey started the 1950s with a fully liberal, Phase V regime and a very rapid rate of economic growth. Balance-of-payments pressures mounted in 1951 and 1952, as domestic inflationary pressures were dampened by a massive and unsustainable flow of imports. By late 1952, payments arrears were massive, and quantitative restrictions were imposed. Two years of reliance upon QRs were followed by multiple exchange rates, export incentives, and other efforts to patch up the system. The restrictiveness of the regime increased sharply as domestic inflation rates reached 20-25 percent per year and exceeded substantially the rate of de facto partial devaluation.

In 1958 Turkey embarked upon a "stabilization program." Gross devaluation increased the official exchange rate more than 200 percent, imports were liberalized, and restrictive monetary and fiscal policies were instituted. Increased export earnings prompted further liberalization after 1960, and Turkey experienced a brief Phase IV episode, with gradually diminishing restrictiveness in her payments regime.

By 1964, however, balance-of-payments pressures were increasing sharply, and reliance on QRs began increasing. The exchange rates became increasingly overvalued, and QRs were employed—along with export incentives, import surcharges, and other price measures—for the remainder of the 1960s. The entire period from 1964 to mid-1970 can therefore be characterized as Phase II.

In 1970 Turkey embarked upon another Phase III devaluation/liberalization program. This was rapidly followed by continued liberalization—Phase IV—which has continued to the time of writing.

In all, Turkey had two Phase II periods of QRs and two devaluation-cum-liberalization episodes. The 1958 Phase III is of particular interest because inflation, which had been at 20 to 25 percent per annum, was brought under control relatively quickly.

#### Trends over Time

Figure 2-1 is a graph showing the number of years for each country in each of the three categories. The average number of years (1961) from the three years. Colombia two years; India

Given the attempt to infer "progress" through the following year, the regime was

The combination of three categories

1. One group, showing a trend toward greater liberalization (Colombia, India)
2. Another group, showing a trend toward greater restrictiveness (Egypt, Indonesia)
3. A third group, showing a trend toward greater restrictiveness (Egypt (in Phase II) as Phase II)

Table 2-6 shows the number of years in each category from 1950. Despite the fact that the exact data suggests certain weaknesses in the countries involved

1. By 1956, all countries had entered a Phase III regime, and by any time after that immediate liberalization. After an initial period of liberalization, countries entered a Phase II sophisticated
2. By the mid-1960s, all countries had entered a Phase II regime

### Trends over Time

Figure 2-1 is a graphic representation of the chronological sequences of phases for each country included in our study. The most obvious feature is that all countries have experienced a variety of changes in their trade and payments regimes. The average time in a phase over all countries (excluding Egypt since 1961) from the time exchange controls were initially adopted was just under three years. Colombia had the shortest average duration of phases—less than two years; India had the longest—just over four years.

Given the frequency of phase changes, it is somewhat hazardous to attempt to infer trends. For example, the Philippines, until 1966, appears to "progress" through the sequence of phases toward full liberalization; the following year, however, quantitative restrictions were reintroduced, although the regime was not highly restrictive and the phase did not last long.

The combined experience of the ten countries seems to fall roughly into three categories:

1. One group, starting initially from Phase I, appears to have moved over time toward greater reliance on pricing measures. This group includes Brazil, Colombia, Israel, South Korea, and the Philippines.
2. Another group has repeatedly attempted liberalizations, none of which has endured; their behavior is best described as "cycling" back and forth between Phases II, III, and IV. This group includes Chile and Ghana.
3. A third group of countries has generally been in Phase II, with only infrequent, short-lived devaluation-cum-liberalization episodes. India, Turkey, and Egypt (insofar as nationalization of all foreign trade can be considered as Phase II) appear to be in this group.

Table 2-6 shows the number of countries in each phase in each year since 1950. Despite the hazards of "counting countries" and the difficulty in judging the exact date of a change from one phase to another, the tabulation suggests certain weak trends that are obscured in observing oscillations in the ten countries individually:

1. By 1956, all countries except Ghana had abandoned a fully liberalized trade regime, and Ghana was one of only two countries that were in Phase I at any time after 1957.<sup>18</sup> Thus, Phase I typically appears to be a short period that immediately follows the abandonment of a liberalized trade regime. After an initial experience with across-the-board quantitative restrictions, countries employing QRs have rejected them in favor of a more sophisticated regime with some reliance on price measures.
2. By the mid-1950s, most of the ten countries were in Phase II. The excep-

PAYMENT REGIMES

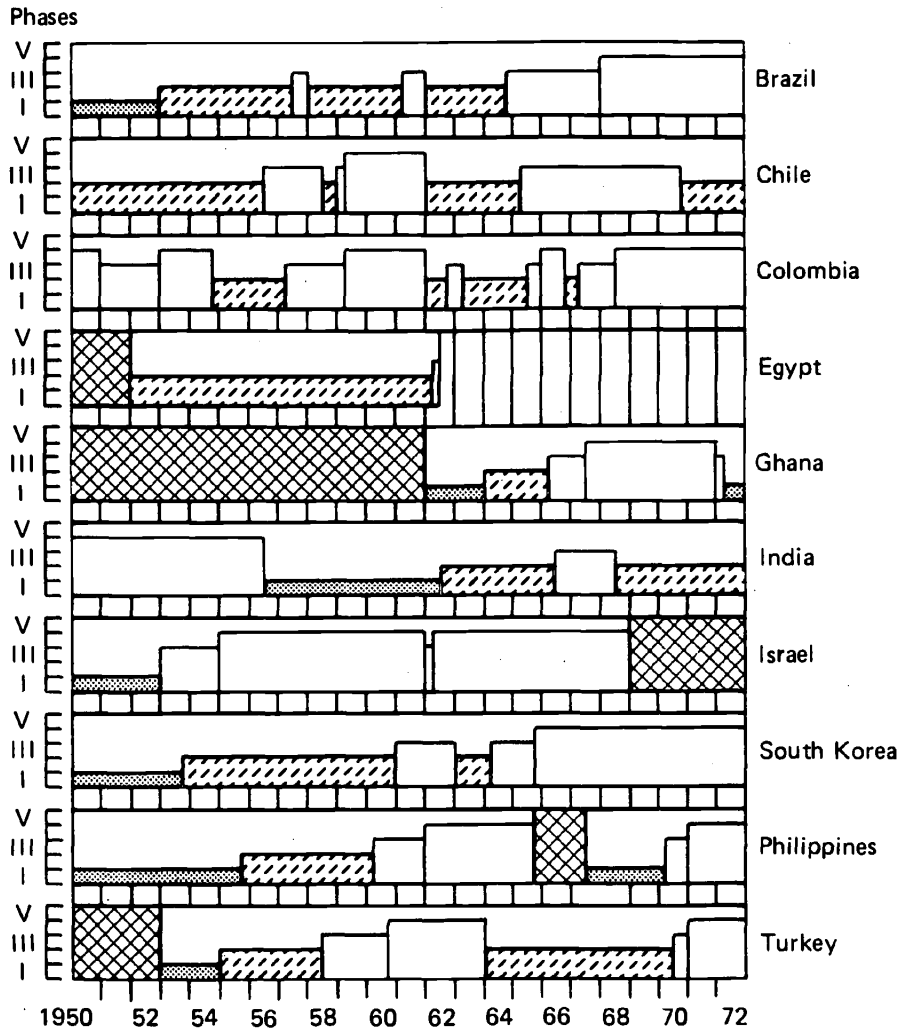


Figure 2-1. Phases of Exchange Control Regimes, Ten Countries, 1950-1972

Table 2-6. Nu converted to a

Year	
1950	4
1951	4
1952	4
1953	2
1954	2
1955	0
1956	0
1957	1
1958	1
1959	1
1960	1
1961	1
1962	1
1963 <sup>b</sup>	1
1964	0
1965	0
1966	0
1967	0
1968	1
1969	1
1970	0
1971	0
1972	0

Source: Text and in

<sup>a</sup>Each country's pha particular phase was country was in Phase

<sup>b</sup>Egypt is excluded her experience does

tions were Gh and India ent same pattern ly the only ex being reduced 3. By the last ha tries, although

Table 2-6. Number of Countries in Each Phase, 1950-1972 (quarterly count converted to annual basis)<sup>a</sup>

Year	Phase				
	I	II	III	IV	V
1950	4.00	1.00	0.00	2.00	3.00
1951	4.00	1.00	1.00	1.00	3.00
1952	4.00	2.00	1.00	1.00	2.00
1953	2.50	3.50	1.00	2.00	1.00
1954	2.00	4.25	1.00	1.75	1.00
1955	0.75	6.25	0.00	2.00	1.00
1956	0.50	6.50	0.50	1.50	1.00
1957	1.00	4.75	2.25	1.00	1.00
1958	1.00	4.75	2.00	1.25	1.00
1959	1.00	4.00	1.50	2.50	1.00
1960	1.00	3.25	1.25	3.50	1.00
1961	1.00	1.00	3.00	4.00	1.00
1962	1.50	3.50	1.75	2.75	0.00
1963 <sup>b</sup>	1.00	4.75	0.25	3.00	0.00
1964	0.00	6.00	1.00	2.00	0.00
1965	0.00	3.75	3.00	2.00	0.25
1966	0.00	2.00	3.25	2.75	1.00
1967	0.50	1.25	4.25	2.50	0.50
1968	1.00	1.50	2.00	4.50	0.00
1969	1.00	2.00	1.00	4.00	1.00
1970	0.25	1.75	2.00	4.00	1.00
1971	0.00	2.00	0.00	6.00	1.00
1972	0.75	2.00	0.25	5.00	1.00

Source: Text and individual country studies.

<sup>a</sup>Each country's phases were dated by quarters, and the number of quarters countries were in a particular phase was summed and divided by four to get the data. For 1970, for example, one country was in Phase I for one quarter.

<sup>b</sup>Egypt is excluded from the tabulations after 1962, since foreign trade was nationalized and her experience does not fit the characteristics of any phase after that time.

tions were Ghana, India, and Israel. Ghana had not yet begun using QRs, and India entered a prolonged Phase I in 1956; both countries followed the same pattern as the majority of the countries, but with a lag. Israel was really the only exception to the trend, in that her reliance on QRs was already being reduced.

3. By the last half of the 1960s, Phase IV prevailed in most of the ten countries, although Israel's liberalization had progressed sufficiently to be

regarded as Phase V. Brazil, Colombia, and South Korea were all in Phase IV; their exports were generally growing rapidly, and their dependence on QRs was diminishing. The Philippines had been in Phases IV and V until 1967 and—after a three-year Phase I episode—reentered Phase IV in 1970.

It is of some interest that, with the exception of Israel and—for a short time—the Philippines, no country totally abandoned controls even on current account transactions.<sup>19</sup> Even South Korea, with perhaps the longest Phase IV experience and with very rapidly growing foreign exchange earnings, did not abandon the vestiges of her QR system. Whether earlier experience with Phase II regimes resulted in a desire to maintain a more viable QR system as represented by Phase IV, or whether another five to ten years will find many countries entering Phase V, is an open question that will be considered subsequently. It is, of course, also possible that countries in Phase IV will go back to a QR regime at some future date.

It is hazardous to infer too much from simple counting of countries. Yet there is some trend toward greater reliance on price measures. Greater sophistication is found in the administration of quantitative restrictions *and* in the use of price incentives to help achieve national objectives.

The country studies include twenty-two devaluations, observed in sufficient depth to permit their analysis on a comparable basis here. It is important to investigate the sorts of policies that have accompanied devaluation, the experiences of countries after Phase III episodes, and the impact that transition to viable liberalized regimes has on growth.

## NOTES

1. U.N. estimates were used in deriving the dollar value of gross domestic products. For a description of the methods employed, which essentially entail using the "best" exchange rate, see United Nations, *Yearbook of National Accounts Statistics 1971*, vol. III (New York, 1973), p. 16.

2. If any country attaining a per capita income level of \$1,000 (or any other cutoff figure) were immediately regarded as noncomparable to countries with income levels below that figure, and the lessons arising out of that country's experience were rejected as irrelevant for other developing countries, only the "failures" would be left to draw upon for comparison. This is a fundamental problem whenever samples of developing countries are used for analysis, but arguments can be made in defense of the procedure vis-a-vis the countries that experienced rapid growth in the nineteenth century. When it comes to a country such as Israel, which was clearly in the "developing" category in the 1950s, it is inappropriate to reject that experience simply because of rapid growth; it is, of course, pertinent to examine whatever special factors may have contributed to that experience, although there are some "special circumstances" confronting every country.

3. Use of constant-price series for the two years would not alter the data significantly. However, a strong caveat is in order when interpreting these data. They are not strictly comparable across countries because of the many reasons indicated in the notes to the table, because of differences in concepts and classifications among countries, and because relative prices differ among

countries. In addition, accordance with their figures.

4. The individual and the environment

5. Price change try studies.

6. On a 1958 base for 1953; 100 for 1955. Inflation of industrial with a marked acceleration.

7. Guarantee, of interest, in the central port license. Often the cleared customs.

8. Note that the for encouraging importives is a central ques

9. One of the hypotheses to be a logic to the evolution of the hypothesis entirely country studies.

10. This leads to nominal exchange rate

11. It should be removal of quantitative not necessarily imply industries.

12. Again, it should maintenance of an additive restrictions would in foreign exchange equilibrium protectionist sentiment ly used as a rationale

13. It was necessary experience statistically country authors gave selected based on a explanation of events was the major departures

14. Behrman call episode. There were, January 1959. To analyze July 1958; Phase II, from and Phase IV, from A

15. See Chapter

16. Leith, p. 7.

17. Michaely does analysis, it is so labeled tent was to reduce the

18. Ghana was in abandoned quantitative crisis in the late 1960s

19. Of course, the tion of whether central criterion South Korea

countries. In addition, the size of the statistical discrepancy, which was prorated among sectors in accordance with their reported size, is sufficiently great to cast doubt on the accuracy of the figures.

4. The individual country studies provide a wealth of information about economic policy and the environment in which it was formulated.

5. Price change data are presented in greater detail in Chapter 8 and in the individual country studies.

6. On a 1958 base the IMF index of the dollar prices of exports of industrial countries is 99 for 1953; 100 for 1958 and 1962; 105 in 1965; 106 in 1968; and 114 in 1970. This implies a rate of inflation of industrial countries' export prices of just over 1 percent a year between 1960 and 1970, with a marked acceleration toward the end of the decade.

7. Guarantee, or "prior," deposits are funds that must be placed, usually without earning interest, in the central bank or other government depository at the time of application for an import license. Often these funds are not returned until after the goods have been financed and have cleared customs.

8. Note that the emphasis is on techniques employed for balance-of-payments reasons, *not* for encouraging import substitution or export promotion. The relationship between the two objectives is a central question in this volume.

9. One of the hypotheses set forth in the analytical framework was that there might appear to be a logic to the evolution of countries through the phases. This author is not prepared to reject the hypothesis entirely, but no meaningful generalizations on this point have emerged from the country studies.

10. This leads to the necessity for distinguishing the effective exchange rate (EER) from nominal exchange rates. Careful definitions of these concepts are presented in Chapter 5.

11. It should be noted that liberalization, as used throughout this volume, refers to the removal of quantitative restrictions and a shift toward reliance upon price interventions. It does *not* necessarily imply a reduction in the protection accorded to import substitutes or to export industries.

12. Again, it should be noted that some QRs might be retained for purposes other than maintenance of an acceptable balance-of-payments position. The important point is that quantitative restrictions would not be imposed or altered in response to present or anticipated changes in foreign exchange earnings. In practice, of course, it is sometimes difficult to determine whether protectionist sentiment arises for balance-of-payments reasons, or whether those reasons are simply used as a rationale for protection.

13. It was necessary to date the phases precisely in each country in order to analyze each one's experience statistically on a comparable basis. In some instances that was clear cut. In others, country authors gave very rough indications of dates, and precise initial and terminal points were selected based on a careful reading of the country study. In still other instances an author's explanation of events was clearly inconsistent with the phase assigned. In the discussion that follows, the major departures from authors' dating are noted.

14. Behrman calls the entire period from July 1956 to December 1958 a single Phase III episode. There were, however, two distinct devaluation episodes, one in July 1956 and one in January 1959. To analyze these, the dating for Chile in this volume is: Phase III, from July 1956 to July 1958; Phase II, from August 1958 to December 1958; Phase III, from January to March 1959; and Phase IV, from April 1959 to December 1961.

15. See Chapter 5 for a discussion of PLD-EERs, or the real exchange rate.

16. Leith, p. 7.

17. Michaely does not label the 1962 devaluation as a Phase III episode but, for purposes of analysis, it is so labeled here. Exchange controls were still in effect prior to devaluation, and the intent was to reduce their importance.

18. Ghana was in Phase I in 1961 and 1972. The other country was the Philippines, which had abandoned quantitative restrictions by the mid-1960s, reentered Phase I in response to a payments crisis in the late 1960s, but liberalized again with a devaluation in 1970.

19. Of course, that statement is also true for most developed countries, and it is really a question of whether controls are altered in response to balance-of-payments pressures. By that criterion South Korea and Brazil should also be regarded as having abandoned controls.