| BIBLIOGRAPHIC DATA SHEET | 1. CONTROL NUMBER PN-AAH-868 | 2. SUBJECT CLASSIFICATION (695) DC00-0000-G354 |
|---|---|---|

3. TITLE AND SUBTITLE (240)

Equitable growth: the case of Costa Rica

4. PERSONAL AUTHORS (100)

Rourk, P. W.

5. CORPORATE AUTHORS (101)

Nathan (R.R.) Associates, Inc.

| 6. DOCUMENT DATE (110) | 7. NUMBER OF PAGES (120) | 8. ARC NUMBER (170) |
|---|---|---|
| 1979 | 100p. | CS339.R862 |

9. REFERENCE ORGANIZATION (130)

Nathan

10. SUPPLEMENTARY NOTES (500)

(In A.I.D. Development Studies Program. Case studies in development assistance no. 6)

11. ABSTRACT (950)

12. DESCRIPTORS (920)

Income distribution
Development strategy
Government programs
Infrastructure
Land reform
Case studies
Costa Rica
Equity
Economic development
Human resources
Salaries

13. PROJECT NUMBER (150)

14. CONTRACT NO.(140)

AID/otr-C-1380

15. CONTRACT TYPE (140)

16. TYPE OF DOCUMENT (160)

74

AID 590-7 (10-73)

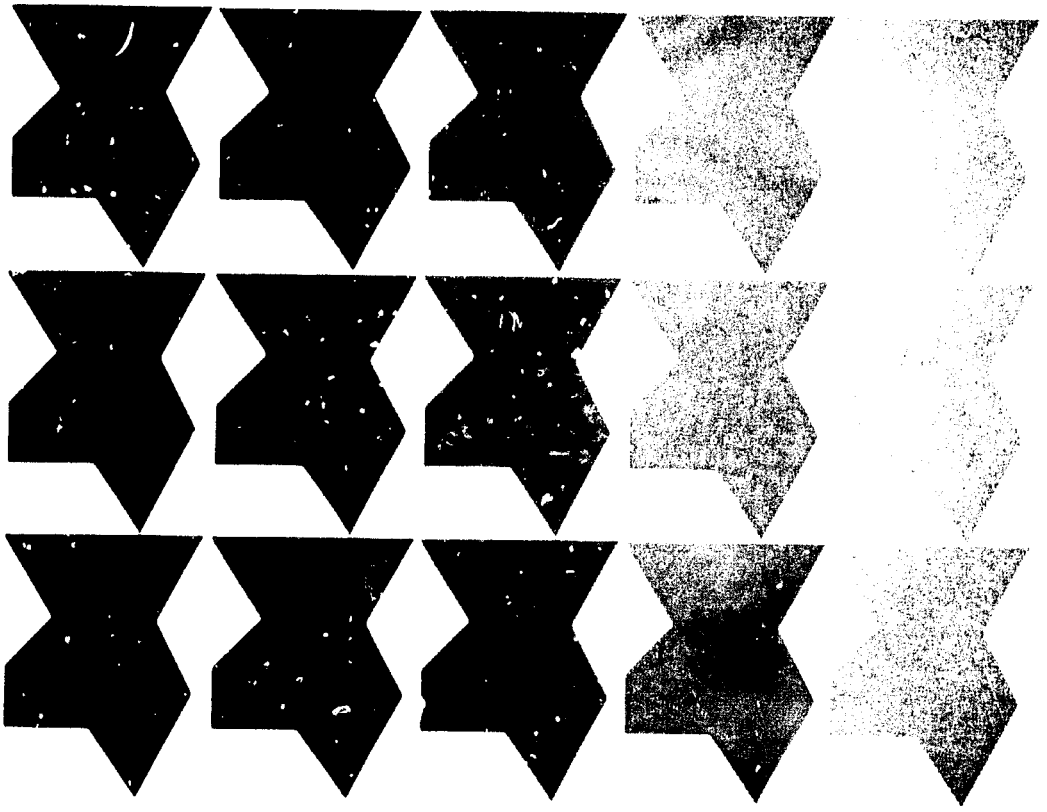
CS
339
R862

PN-AAH-868

DEVELOPMENT STUDIES PROGRAM

Case Studies in Development Assistance No. 6

# Equitable Growth: The Case of Costa Rica



Agency for International Development
Washington, D.C. 20523

Development Studies Program

Case Studies in Development Assistance No. 6

# EQUITABLE GROWTH: THE CASE OF COSTA RICA

Phillip W. Rourk
Robert Nathan Associates, Inc.
Washington, D.C.

This paper reflects the views of the author and not necessarily the views of the Agency for International Development

## TABLE OF CONTENTS

PREFACE

I. EQUITABLE GROWTH IN COSTA RICA: OVERVIEW

II. COSTA RICA'S DEVELOPMENT - A HISTORICAL PERSPECTIVE

A. The Physical Setting
B. The Colonial Period
C. Economic Development after Independence
D. Costa Rica's Political Development
E. Summary and Evaluation

III. PUBLIC SECTOR PROGRAMS

A. Physical Infrastructure

1. Roads
2. Electricity
3. Housing

B. Human Resources

1. Education
2. Health Care Services
3. Asignaciones Familiares
4. Nutrition

C. Others

1. Land Reform
2. Wages Policy

IV. ISSUES AND ALTERNATIVES FOR EQUITABLE DEVELOPMENT

FOOTNOTES
ANNEX A: Basic Social and Economic Indicators
ANNEX B: Income Distribution in Costa Rica
BIBLIOGRAPHY
LIST OF TABLES
ACRONYMS USED

## Acknowledgment

I am grateful to the Development Studies Program and to the Administrator's Development Seminar for having supported this work and thus for having permitted me to gather valuable lessons from the remarkable development experience of the Costa Rican people. I owe special thanks to Mr. John Westley of the DSP and to Mr. Victor Hugo Cespedes of La Academia de Centroamerica to the substance of the work. Many others, in and out of the Costa Rican government, at USAID/Costa Rica, AID/Washington, and among my colleagues at Robert R. Nathan Associates, have given of their time and knowledge. My thanks to them all.

## PREFACE

During the past decade, development planners have recognized the inadequacies of the time honored and generally accepted GNP per capita as an indicator of overall economic growth. Discovery of the paradox which showed that most developing countries actually 'took-off', as reflected in an increase of per capita GNP, while the majority of its people were left behind, called for a re-examination of policy planning objectives. New emphasis was placed on equitable growth and of income distribution as the prerequisites of economic development.

Today, the concept of equity is no longer a construct in the mind of the economist, but a necessary process if the benefits of economic development are to accrue to the poorest of the world's poor.

Growth with equity, as an objective of developmental planning, has been accepted by decisionmakers in the developing and developed countries alike. AID's "New Directions" are formulated in explicit recognition of the importance of the attainment of this objective. However, the design of equity strategies is not restricted to AID as a donor agency. Equity growth strategies constitute the essential elements of Costa Rica's development policy, whose implementation is actively pursued by her government. In spite of the difficulty, constraints, and occasional setbacks in implementing such a policy, Costa Rica serves as an example of a nation determined to maintain its relatively

high standards of living within the context of Latin America.

It is for this reason that the Development Studies Program is pleased to present the case of Costa Rica as an illustration of a developing country whose efforts and commitments to the goals of equitable income distribution and of equity growth deserves careful attention.

Michael Calavan
Acting Director
Development Studies Program
July 1979

## I. EQUITABLE GROWTH IN COSTA RICA: OVERVIEW

Increased concern in recent years with "equity" objectives of development - employment, equality, participation, meeting "basic needs" - has led to a search for cases of successful equitable growth. The list of such cases is relatively short. It varies from observer to observer, but generally includes Taiwan, China, South Korea, Sri Lanka and Tanzania. If the list is extended to countries no longer regarded as "less-developed", it would also include Israel, Yugoslavia, and perhaps Japan, Rumania and the Soviet Union.

Latin America is not heavily represented on such lists. Cuba and Uruguay are possible candidates, but they do not qualify as cases of equitable growth, since per capita GNP has actually declined in post-revolutionary Cuba, and has been stagnant for the past two decades in Uruguay. Otherwise, Latin America is more notable for case of inequitable growth - Brazil, Mexico, Colombia - than equitable growth. The one real exception is Costa Rica, which has maintained rapid GNP growth over a long period and appears to have been successful in di-distributing the benefits of growth fairly widely.

Unfortunately, the Costa Rica case has received relatively little attention in the literature on equitable growth. Costa Rica was mentioned in Chenery et. al.'s Redistribution with Growth as a country "in which the poor have shared equitably in income growth",[1/] but Costa

Rica was not included among the case studies in the Annex to the book, and has not been the subject of study for this purpose elsewhere. The aim of this paper is to fill that gap, at least partially, by providing a brief analysis of Costa Rica's development performance, and the factors which account for that performance. As a broad framework for the discussion, we will use the diagram reproduced as Figure 1, which relates the overall objective of elimination of poverty (or meeting "basic needs") to a series of sub-objectives, and relates these objectives and sub-objectives in turn to various "areas of intervention" or arenas for policy and program action. (see Figure 1)

Figure 1: Basic Needs - Oriented Development Policies -- Schematic

| Objective | Sub-objectives | Policy Areas |
|---|---|---|
| Meeting Basic Needs (on a sustainable basis) | 1. Growth in per capita GNP | 1. Asset distribution |
| | 2. Equity | 2. Organization |
| | 3. Participation/Self-Reliance | 3. Employment |
| | 4. Stability/Adaptability | 4. Resource mobilization and allocation |
| | | 5. Pricing |
| | | 6. Technology |
| | | 7. Investment transfers |
| | | 8. Consumption transfers |

Schematic by John Westley, DSP/AID

Costa Rica's performance with respect to the basic needs objective and the equitable growth sub-objectives has been generally excellent, although it is somewhat difficult to assess achievement of the basic needs objective directly. "Basic needs" have been defined to include minimum requirements for private consumption, such as food, shelter and clothing, plus essential community services such as safe drinking water, sanitation, and health and educational facilities.[2/] Alternatively, these "basic needs" may be aggregated and expressed in terms of a minimum income or poverty line, so that achievement of basic needs objectives may be judged by the rate at which the size of the population below the poverty line is reduced. Unfortunately, data on basic needs and absolute poverty are not yet available in a form which permits assessment of performance among all developing countries. There are some recent data in a study by the Economic Commission for Latin America (ECLA) which permit comparison between Costa Rica and a few other Latin American countries in terms of a "destitution line" (defined as the income required to purchase a minimum food basket of forty items) and a "poverty line" (defined as twice the income required to buy the minimum food basket). The estimates are as follows:[3/]

| | Percentage of Households below Destitution Line | Percentage of of Households below Poverty Line |
|---|---|---|
| Costa Rica | 6 | 22 |
| Argentina | 1 | 8 |
| Brazil | 25 | 45 |
| Colombia | 17 | 43 |
| Mexico | 12 | 35 |

It is interesting to note that Brazil and Mexico, whose per capita GNP levels are roughly equivalent to Costa Rica's, have much higher proportions of their populations below these income-based poverty lines. (For comparative data on these and other selected countries, see Table 1). Argentina has a much higher per capita GNP and lower poverty figures than Costa Rica, but its Physical Quality of Life Index (PQLI) is the same as Costa Rica's, indicating that Costa Rica has been able to provide broad access to health and educational services at a somewhat earlier stage of development.

Fortunately, this "Physical Quality of Life Index" (PQLI), a reasonably good proxy indicator for basic needs fulfillment, is available for nearly all developing countries and has recently been extended to include an indicator of performance over time, termed the "disparity reduction rate" (DRR). The PQLI measure consolidates three indicators -infant mortality, life expectancy at age one, and literacy - into a single composite index ranging from 0 to 100, while the DRR assigns a percentage figure to the annual rate at which a country reduces the disparity between its PQLI and a PQLI of 100.[4/] Costa Rica's PQLI is now 85, as compared with 95 for the United States, 91 for Puerto Rico, and an average of 86 for upper middle-income developing countries (per capita GNP between $700 and $1.999).[5/] Among the Latin American countries listed in Table 1, Costa Rica's PQLI is exceeded only by Uruguay's (86), but Uruguay's per capita GNP is also substantially higher than

Table 1. Indicators of Development Performance - Selected Countries

| | Population (millions) mid -1976 1/ | Population Growth Rate 1970-1975 | GNP Per Capita (US Dollars) 1976 1/ | Growth Rate (percent) 1960-1976 1/ | Index of Per Capita Food Production 1965-67 =100 Av. 1974-1976 1/ | Gini Coefficient 2/ latest | Physical Quality of Life Index (PQLI) 3/ 1970s | Disparity Reduction Rate (DRR) 3/ (percent) 1950s - 1970s |
|---|---|---|---|---|---|---|---|---|
| COSTA RICA | 2.0 | 2.5 | 1040 | 3.4 | 130 | 0.44 | 85 | 3.7 |
| EL SALVADOR | 4.1 | 3.1 | 490 | 1.8 | 108 | 0.47 | 64 | 2.5 |
| GUATEMALA | 6.5 | 3.2 | 630 | 2.4 | 114 | - | 54 | 1.7 |
| HONDURAS | 3.0 | 2.7 | 390 | 1.5 | 102 | 0.63 | 53 | 2.7 |
| NICARAGUA | 2.3 | 3.3 | 750 | 2.4 | 103 | - | 55 | 1.7 |
| PANAMA | 1.7 | 3.1 | 1310 | 3.7 | 114 | 0.43 | 79 | 2.5 |
| ARGENTINA | 25.7 | 1.3 | 1550 | 2.8 | 104 | 0.44 | 85 | 2.0 |
| BRAZIL | 110.4 | 2.9 | 1140 | 4.8 | 114 | 0.61 | 66 | 1.6 |
| COLOMBIA | 24.2 | 2.8 | 630 | 2.8 | 106 | 0.56 | 72 | 3.2 |
| CUBA | 9.5 | 1.8 | 860 | -0.4 | 95 | - | 85 | - |
| MEXICO | 62.0 | 3.5 | 1090 | 3.0 | 98 | 0.58 | 75 | 2.3 |
| URUGUAY | 2.8 | 0.4 | 1390 | 0.6 | 110 | 0.43 | 86 | 1.3 |
| CHINA | 835.8 | 1.7 | 410 | 5.2 | 108 | - | 68 | - |
| SOUTH KOREA | 36.0 | 1.8 | 670 | 7.3 | 104 | 0.36 | 82 | 3.9 |
| SRI LANKA | 13.8 | 1.7 | 200 | 2.0 | 110 | 0.35 | 82 | 3.5 |
| TAIWAN | 16.3 | 2.0 | 1070 | 6.3 | - | 0.28 | 87 | 5.0 |
| TANZANIA | 15.1 | 2.7 | 180 | 2.6 | 113 | 0.60 | 80 | 1.5 |

1/ Source: The World Bank, World Development Report, 1978, Washington, D.C. August 1978, Annex Table 1.

2/ Source: Shail Jan

3/ Source: James P. Grant, "Disparity, Reduction Rates in Social Indicators," Washington, D.C. Overseas Development Council, Monograph No. 11. September 1978, Annex B.

Costa Rica's; Argentina and Panama also have high PQLI, but like Uruguay have higher per capita GNP levels, while countries with similar GNP levels, such as Brazil and Mexico, have significantly lower PQLI's than Costa Rica's. That is, no country listed (except Cuba) has achieved a PQLI in the 80's at a per capita GNP level as low as Costa Rica's.[6/] This outstanding performance in meeting basic needs (as measured by the PQLI) is confirmed by the PQLI disparity reduction rate (DRR) figures listed in Table 1. Costa Rica's DRR of 3.7% for the period of the 1950s-1970s is greater than the DRR for all other Central American countries and for the South American countries listed, and is roughly equal to the DRRs from Shri Lanka and South Korea; it is significantly exceeded only by Taiwan's DDR of 5.0%, which is the highest recorded for any developing country.[7/]

Basic needs or poverty reduction objectives can generally be met most expeditiously through a development process which combines rapid output growth per capita with relatively equitable access to the benefits of growth, although the appropriate weighting of the "growth" sub-objective and various "equity" sub-objectives (i.e., employment, income equality, participation) obviously depends on each country's situation.

In Costa Rica's case, per capita GNP growth over the period 1960-1976 averaged 3.4% per annum, compared with low-income country average of 0.9% and the middle-income country average of 2.8%.[8/] Among the Latin American countries listed in Table 1, this growth rate was exceeded only by Panama

and Brazil.[9/] This rapid growth has been accompanied by the usual structural changes, with agriculture declining in importance relative to industry, commerce and services. In terms of employment by sector, agriculture's share declined from about 55 to 36 percent from 1950 to 1973, while industry's share increased slightly from 11 percent to 12 percent, and the shares for commerce and services have expanded from 15 to 23 percent respectively (see Table 2). Costa Rica's growth was also accompanied by diversification in agricultural production and substantial expansion of manufacturing output; rapid export growth (averaging 9 percent per annum during the 1960s); steady increases in per capita food production (see Table 1); and the maintenance of considerable price stability.[10/] (For other growth indicators for Costa Rica, see Annex A, "Basic Social and Economic Indicators").

The degree to which Costa Rica's rapid growth contributed to meeting basic needs or reducing poverty on a sustainable basis is difficult to assess without taking into account the pattern of growth, as manifested by performance with respect to the other sub-objectives listed in Figure 1 - employment, equality, and participation or self-reliance. Data on unemployment are notoriously unreliable, especially on a comparative basis, but government figures indicate that open unemployment has remained in the 6-7 percent range for the past two decades, and was 6.2 percent in 1976. This performance is creditable in comparison with other Latin American countries. It is remarkable not only

Table 2 Economically Active Population by Sector of Employment, 1950, 1963, 1973

| Sector | Absolute numbers | | | Percentages | | | Growth rates | | |
|---|---|---|---|---|---|---|---|---|---|
| | 1950 | 1963 | 1973 | 1950 | 1963 | 1973 | 1950-63 | 1963-73 | 1950-73 |
| TOTAL | 271,984 | 395,273 | 585,313 | 100.0 | 100.0 | 100.0 | 2.9 | 4.0 | 3.4 |
| Agriculture | 148,837 | 194,309 | 213,226 | 54.7 | 49.1 | 36.4 | 2.1 | 0.9 | 1.6 |
| Mining | 754 | 1,127 | 1,557 | 0.3 | 0.3 | 0.3 | 3.1 | 3.3 | 3.2 |
| Industry | 29,870 | 45,332 | 69,917 | 11.0 | 11.5 | 11.9 | 3.3 | 4.4 | 3.8 |
| Commerce | 21,412 | 38,660 | 67,675 | 7.9 | 9.8 | 11.6 | 4.6 | 5.8 | 5.1 |
| Transport | 9,465 | 14,738 | 24,964 | 3.5 | 3.7 | 4.3 | 3.5 | 5.4 | 4.3 |
| Construction | 11,625 | 23,304 | 39,078 | 4.2 | 5.9 | 6.7 | 5.5 | 5.3 | 5.4 |
| Services | 40,166 | 68,080 | 132,646 | 14.6 | 17.2 | 22.7 | 4.1 | 6.9 | 5.3 |
| Energy | 1,607 | 4,215 | 5,531 | 0.6 | 1.1 | 0.9 | 7.7 | 2.8 | 5.5 |
| Other | 8,248 | 5,508 | 30,719 | 3.0 | 1.4 | 5.2 | -3.1 | 18.8 | 5.9 |

Source: Dirección General de Estadistica y Censos, Censo de Población, 1950, 1963 y 1973 (San José).

in the context of Costa Rica's labor force growth of about 4 percent per annum, but also given the degree to which the economy is exposed to externally induced instability. As indicated in Table 2 above, employment grew in absolute terms in all sectors, but in percentage terms it grew most rapidly in the commerce, construction, and services, and "other" categories. Much of this employment growth has taken place in the public sector.

Although Costa Rica's employment record is quite good, it was performance with respect to the sub-objective of income equality that first attracted widespread attention to Costa Rica as an example of equitable growth. Data published in 1973 indicated that the Gini coefficient for family incomes had declined from 0.52 in 1961 to 0.44 in 1971, implying a fairly substantial improvement in income distribution during a period of rapid growth.[11/] This contrasted sharply, for example, with the well-known case of Brazil, where the Gini coefficient during the decade of the 1960s appeared (according to one set of data) to have increased from 0.60 to 0.64.[12/] Among Latin American countries, only Argentina, Panama and Uruguay have Gini coefficients as low as Costa Rica's, and the share of income (5.4 percent) accruing to the bottom 20 percent of the income distribution is exceeded only by Argentina. (see Table 1a)

**Table 1a.** Comparative Data on Household Income Distribution

Selected Countries

| Country and Data Year | Bottom 20% | Second Quintile | Third Quintile | Fourth Quintile | Top 20 percent | Gini Coefficient |
|---|---|---|---|---|---|---|
| COSTA RICA (1971) | 5.4 | 9.3 | 13.7 | 21.0 | 50.6 | 0.44 |
| EL SALVADAOR (1969) | 3.7 | 8.7 | 14.0 | 22.8 | 50.8 | 0.47 |
| GUATEMALA | - | - | - | - | - | - |
| HONDURAS (1967-68) | 3.0 | 4.3 | 8.2 | 16.8 | 67.7 | 0.63 |
| NICARAGUA | - | - | - | - | - | - |
| PANAMA (1972) | 4.6 | 10.6 | 15.5 | 21.9 | 47.4 | 0.43 |
| ARGENTINA (1961) | 6.9 | 9.7 | 13.3 | 19.2 | 50.9 | 0.44 |
| BRAZIL (1970) | 2.4 | 5.3 | 9.8 | 18.0 | 54.5 | 0.61 |
| COLOMBIA (1970) | 2.9 | 7.1 | 11.6 | 18.9 | 49.5 | 0.56 |
| CUBA | - | - | - | - | - | - |
| MEXICO (1969) | 4.2 | 6.0 | 9.7 | 16.9 | 63.2 | 0.58 |
| URUGUAY (1967) | 4.4 | 9.8 | 15.2 | 23.1 | 47.5 | 0.43 |
| CHINA | - | - | - | - | - | - |
| SOUTH KOREA (1971) | 7.2 | 11.5 | 15.8 | 22.1 | 43.4 | 0.36 |
| SRI LANKA (1973) | 7.3 | 12.0 | 16.1 | 21.8 | 42.8 | 0.35 |
| TAIWAN (1969) | 8.8 | 13.5 | 17.5 | 23.0 | 36.2 | 0.28 |
| TANZANIA | 2.3 | 5.5 | 10.1 | 18.8 | 63.3 | 0.60 |

Source: Shail Jain, Size Distribution of Income, The World Bank, 1975 Washington, D.C.

However, while the data available suggest that the figure for Costa Rica's 1971 Gini coefficient is reliable, they also suggest that there were no factors which would account for an improvement of the magnitude represented by the decline from 0.52 to 0.44. No survey or census data exist which corroborate the 0.52 figure for 1961. Fragmentary evidence, which has been pieced together and is discussed in Appendix B, strongly suggests that the Gini coefficient was in fact already in the 0.44 range in 1961. Consequently, the problem is not to account for the improvement in income distribution during the 1960s, but to investigate the factors which had produced a stable and relatively favorable income distribution by the decade of the 1950s. For a detailed discussion of the income distribution data for Costa Rica, see Annex B.

Turning briefly to the sub-objective of participation and self-reliance, it is important to note that Costa Rica is generally regarded as virtually unique in Latin America in its commitment to social and political democracy and its tradition of peaceful transfers of power from president to president and party to party. This commitment to democracy at the national level has apparently not been accompanied by a commitment to participation at the subnational level and provincial self-reliance. Nevertheless, Costa Rica's history of democratic politics has had a strong influence on the achievement of equitable growth, as we shall see below.

What accounts for Costa Rica's excellent performance in achieving equitable growth? Costa Rica provided a social and political environment within which conventional economic development policies had relatively equitable outcomes, very much in line with the assumptions of the development economics of the 1950s and 1960s: in Costa Rica,"trickle down" policies worked. That is, the historical evolution of Costa Rica had resulted in relatively widespread access to land, capital, and power, and, as one writer put it, the "predominant democratic cultural symbol became the red-tiled mountain farm for the farmer and the village shop for the small entrepreneur".[13/] Under these favorable "initial conditions", rapid growth could bring about fairly broad distribution of the benefits of development, both through broad participation in the economy's basic productive processes, and through political pressures for rapid increases in expenditures on health, education, social services, and public employment.[14/] Rapid growth thus benefited large numbers of small producers directly, and benefited even more people indirectly through rapidly increasing government revenues and subsequent expenditures on social programs.

In terms of the categorization of "policy areas" set forth in Figure 1, Costa Rica relied most heavily on conventional resource mobilization and allocation policies and on consumption transfers.[15/] This distinguishes Costa Rica from other cases of equitable growth, (or prescriptions for equitable growth), which emphasize the import-

ence of other "policy areas", i.e., land reform (China, South Korea, Taiwan), local organization (China, Taiwan, Tanzania), appropriate technology (China, Taiwan) pricing of capital, labor, foreign exchange, and agricultural products (South Korea, Taiwan), and investment transfers targeted on specific groups (the IBRD/IDS "Redistribution with Growth" strategy).[16/]

To some extent these differences are more apparent than real, however, since under Costa Rica's conditions many of these "policy areas" simply did not require significant policy action. Land was available to small farmers, and was more equally distributed than elsewhere in Latin America. The open democratic system in a country as small as Costa Rica made decentralization and local organization less critical than it would be in larger, less democratic countries. Costa Rica's small size made it easier to avoid the temptations of "import substituting industrialization" policies with their accompanying distortions in the relative prices of products, factors , and foreign exchange.[17/] Moreover, political pressures probably had a favorable impact on the distribution of investment (e.g., in physical infrastructure), just as they had a favorable impact on the distribution of social services ("consumption transfers").

The key elements in the Costa Rica "model" are thus the "initial conditions" which provided an environment within which conventional high-growth policies could have a reasonably equitable

impact (or at least prevented high-growth policies from having the inequitable impact they had in countries such as Brazil), and the public sector programs which tended to reinforce the equitable tendencies of the basic growth process. The "initial conditions" and their roots in Costa Rica's historical development will be discussed in Chapter 2. Chapter 3 will review public sector programs and their impact, and Chapter 4 will discuss some of the issues raised by current plans and prospects for Costa Rica's development.

Figure 2: Costa Rica - Geographic Regions

## II. COSTA RICA'S DEVELOPMENT: A HISTORICAL PERSPECTIVE

A brief historical analysis of Costa Rica's economic and political development is necessary for an understanding of the "initial conditions" which contributed to the achievement of relatively equitable growth in the period after World War II. It will be argued that developments during the colonial and independence periods set the economic pattern characteristic of a dualistic and primary export growth oriented process. Although this lopsided process did not lead to catastrophic conditions for the population of Costa Rica, understanding of these forces at work is imperative for development planners and strategists elsewhere.

### A. The Physical Setting

Costa Rica occupies an area 50,900 sq. km (approx. 23,000 sq. mi.) in extent, slightly smaller than the state of West Virginia. Although the country enjoys a wide variety of microclimactic zones due to its rugged topography, its land area may be subdivided for most purposes into five basic ecological regions (see map below). Orienting ourselves from the most prominent topographical feature, a mountain range running Northwest to Southeast approximately through the center of the country (this range includes about a dozen peaks higher than 10,000 ft.) these regions are: 1) The Northern Plains - relatively flat, well-nourished by rivers and streams, average temperatures from 24 -28 degrees C., humid (2-4 meters annual rainfall), 2-4 month dry season; 2) The Atlantic

Coastal Region - also flat and hot, humid to very humid (up to 5.5 meters rainfall), shorter dry season; 3) The Southern Pacific Coastal Region - more broken, hot to very hot, humid to very humid, short dry season; 4) The Northern Pacific Coastal Region - contains both broken areas and extensive plains, hot, dry (1-2 meters rainfall), 4-6 month dry season; 5) The Central Plateau - today the major population center of the country containing the cities of San Jose, Cartago, Heredia, and Alajuela; average elevation approximately 3,000 ft., average temperatures of 20 degrees C., 2-3 meters annual rainfall, 4 month dry season; this area contains volcanic soils considered to be the richest in the country.

B. The Colonial Period

Colonization of Costa Rica took place in the early 1500s with the arrival of the Spanish conquistadors. A widely dispersed Indian population of approximately 30,000 presented few obstacles to the colonizing Spaniards.[1/] However, because of the country's lack of mineral wealth and its lack of indigenous manpower for plantation agriculture, the economy did not become dominated by mining and large scale commercial agriculture. The principal settlements, including the city of Cartago, were established in the Central Plateau where a mild and healthy climate permitted the cultivation of wheat. The great majority of the population lived and worked on small family

sized farms employing family labor. Jurisdiction over the colony was in the hands of the Audiencia de Guatemala, whose administration of this poor and sparsely populated province went beyond neglect to the point of severely retarding its development,

By 1821, a small population of about 70,000, consisting of poor, independent, family farmers, concentrated in the Central Plateau region and lived relatively isolated from the rest of the world. Social stratification of any consequence had not developed. Hired labor was virtually unknown, and social relations were primarily based on the interactions of independent family groups. Specialization in trades, crafts, or commerce was insignificant. External commerce was so limited that for a good part of the colonial period, the predominant currency was the cocoa bean. Because of the lack of foreign exchange tools, machinery and manufactured goods were very scarce. Neither an aggressively missionary Church, whose influence in secular matters was so strong elsewhere, nor the social hierarchy and ethic based on latifundia had yet found a foothold on Costa Rican soil. In sharp contrast to the rigid social, political and economic structures existing in other parts of Spanish America, Costa Rica, at the time of independence, was a nation of loosely governed, poor but self-sufficient 'yeoman' farmers. This backwardness concealed a potential for change which was later to prove a major asset.

Costa Rica's Economic Development

Costa Rica's self-sufficient economy and its isolation from the world market changed dramatically in the mid-18th century with the introduction of coffee bean cultivation. The Central Plateau was found to be ideally suited for the cultivation of high grade coffee beans that could command a premium price on the world market, where the coffee commerce had expanded from 140 million pounds in 1800 to over a billion pounds by 1870.

As early as 1821, the Ayuntamiento de San Jose had encouraged the cultivation of coffee by providing free nursery material and public lands. However, transportation and marketing difficulties impeded progress, obliging the Costa Ricans to sell their coffee through Chilean intermediaries. The coffee bonanza was set in motion in 1844 with the establishment of direct commercial ties with Great Britain who provided not only the needed credits but also access to her imperial markets. Cultivation and export of coffee thus became the long-sought engine for change and growth of the Costa Rican economy, whose coffee production grew rapidly from about 3,000 metric tons in 1854 to over 16,000 metric tons by 1900.

Four internal factors facilitated the transition from subsistence agriculture to export agriculture based on coffee:

1. lack of competing cash crops;
2. availability of public land used for cultivation; *
3. exemption of coffee from the diezmo, a 10 percent tax collected by the Church on most agricultural products;
4. domestic stability and relative internal tranquility in the years following independence.

By about 1850, however, clearly recognizable dualistic growth processes were at work which sharply altered land tenure, economic and social relations and income distribution. A so-called Coffee Oligarchy had come into existence that controlled the export and import commerce of the country. Its rise and dominance can be attributed to three main factors: (1) individual initiative and entrepreneurship; (2) the selective distribution of significant amounts of credits; (3) specialization in the export of washed coffee beans.

Although entrepreneurship is a necessary attribute for engaging in trade and commerce, achievement motivation is seldom found to be evenly distributed among individuals. Since not everyone responded to the new opportunities with the same alacrity, a few families in favorable positions took advantage of the credit and assistance provided by the British importers.

---

* In contrast to other Latin American countries, neither the Church, nor the latifundistas nor Indian ejidos controlled large quantities of land, making it easy to bring new public lands into production.

Distributed in form of cash advances against future deliveries, these loans were administered by local intermediaries and buyers, who also were the largest producers. Their families and friends would receive preferential access to this money, thereby facilitating their expansion. Furthermore, since credit was only available for coffee production, its introduction greatly accelerated the displacement of food and other subsistence crops, accentuating the country's rush toward monoculture and dependence. By 1893 imports of wheat, flour, corn, beans, rice, tobacco, butter and lard had reached 12.4 percent of the total value of exports. In the same year, imports of wine, perfume, cashmeres, cognac, and fine jewelry amounted to 14 percent of the value of exports.[2/]

Specialization in the export of washed coffee, which was more competitive in the discriminating British market, further divided the Costa Rican population along economic lines. Since the processing of washed coffee called for heavy investment in fermentation tanks, buildings and machinery, small producers could not become processors. They either sold out, or continued to produce, selling their crops to larger producer-processor exporters at substantially reduced prices. Many of the small and medium producers who invested in the required machinery were overcome by debts and loss of their properties through foreclosures. Those who succeeded increased their holdings and maximized their incomes through the export of this lucrative commodity. There is ample evidence that in the single

year 1892, by value, approximately 11 percent of all registered property changed hands.[3/] Assuming that the bulk of these properties was small, we may, somewhat impressionistically, infer the magnitude of the problem.

As shown above, the selective availability of credits combined with specialization of export of a single coffee crop, i.e., washed coffee, altered the economic structures of Costa Rica to such an extent that it permitted: (1) the concentration of land into very large holdings and, (2) the emergence of a large class of landless peasants and minifundistas employing low levels of technology. Unable to compete with the larger producers, many of them were forced to sell their labor to the larger producer-exporters.

The changing structure of production and land tenure, however, did not at first affect severely the distribution of income. Though land was increasingly concentrated, Costa Rica avoided extreme poverty because of its relatively small population and low labor-land ratio. Furthermore, the increasing migration out of the Central Plateau by displaced farmers in search of new lands, coupled with the needs and requirements of the expanding coffee industry, ensured relatively high and rising wages until the turn of the century.[4/]

The expanding coffee industry stimulated not only the establishment of a transportation network but also encouraged the creation of banking and financial institutions. Both systems were financed

and controlled largely by British and American investors in association with Costa Rica's coffee exporters. Realizing that these banks might not be operating "entirely in the interest of Costa Rica", several, ultimately unsuccessful government banks were created, of which the Banco Nacional was the most important one.

The government's repeated efforts to build a railroad to the Atlantic port of Limón were frustrated by its desperate financial situation. After having spent nearly half of its revenues - approximately $15 million over the period 1870-82 - and an additional 3.5 million pounds sterling of foreign debts, the government signed the now famous Soto-Keith contract in 1884. The terms of this contract required Minor C. Keith, a U.S. engineer and entrepreneur, to finance the English debt and to finish within three years the remaining 52 miles of the 142-mile railroad. In return, he was granted a 99-year lease on the railroad, later to be converted to outright ownership as a result of yet another English debt; was given 800,000 acres of state lands in any part of the country; and was exempted from payment of import duties. Facing financial difficulties himself, Keith began to plant banana trees on his Atlantic coastal lands flanking the railroad. These plantings, which gave birth to the United Fruit Company, saved him financially and enabled him to finally complete the railroad in 1890. The anticipated savings in maritime shipping cost

resulting from the completion of the track were mostly absorbed by railroad carriage rates much higher than expected, and by a coffee export tax imposed for payment of construction costs. Huge foreign indebtedness had been incurred for the first time, and a powerful foreign enclave had been admitted to the national economy. Further land concentration and displacement occurred along the length of the railroad, and reinforced the trend toward an unhealthy dependence on exports to the detriment of production for local consumption. Ironically, the opening of the Panama Canal in 1914 largely obviated the need for this expensive bit of track.

D. Costa Rica's Political Development

The early post-independence period was marked by a series of coups and minor dictatorships, as the adherents of one personality or another succeeded each other into power. The change on the top, however, did not significantly interrupt the continuous dominance of a small oligarchic class.

The birth of representative democratic institutions, in a functional sense, can be attributed to the influence of the so-called 'generation of 1889'. The sons of the first coffee growers, educated in Europe and imbued with the ideals of classical liberalism, achieved control towards the end of the century. Although direct elections were not held until 1923, and women's suffrage and the elimination of property requirements for public office were not achieved until 1949, the election of 1889 marked the beginning of a new era, characterized by popular representa-

tion. With only two brief interruptions (1917-19 and 1948-49), Costa Rica has adhered to the orderly and constitutional transfer of power to the present day.

During the administration of Bernardo-Soto and of his Minister of Education, Mauro Fernández, genuine educational reforms took place. The Ley General de Educación Común, approved in 1886, brought the widely disparate system of municipal schools under the control of the central government, permitting the institution of uniform standards and requirements. The universities were considered a luxury the country could not afford. With the exception of the Law School of the University of Santo Thomas, the university system was dissolved until 1940. Instead, heavy emphasis was placed on primary and secondary education, resulting, according to official figures, in a reduction of illiteracy from over 70 percent in 1892 to about 25 percent in 1927.[5/]

The boom-and-bust coffee cycle has become a stereotype of commodity markets in this century. For Costa Rica, the twentieth century came in with a bust. Following record highs in 1894, probably associated with reduced production in Ceylon and Java due to disease, coffee prices plunged 50 percent by 1900. Although coffee prices recovered periodically before the outbreak of World War I and during the boom immediately preceding the Great Depression, Costa Rica's population growth by this time outpaced coffee expansion, causing widespread unemployment and successive waves of property foreclosures.

Unemployment remained high, and what little investment took place was concentrated on coffee and banana export production. The potential of diversified economic development was checked by the limited extent of the internal market. The overall rate of savings was low, while the level of imports of conspicuous luxury items grew.

The Depression and World War II generated a series of crises that exposed the debility of the old order. The 1940s and early 1950s were periods of turmoil from which Costa Rica was not spared. Largely due to its unique social and cultural background, however, the resolution of conflict resulted in quite a different trajectory from that taken by other nearby societies facing similar problems.

In response to the unemployment problem and the unrest it provoked, the government approved a series of measures during the late 1930s whereby public lands could be turned over to individuals willing to work them. The only remaining unoccupied lands by this time were located outside the Central Plateau in underdeveloped regions of the country. However, the heavy investment required to prepare such land, the lack of market roads, transport, credit, and the bureaucratic expense and delay involved in securing titles resulted in a failure of this approach. Illegal squatting on privately owned lands spread throughout the Central Plateau causing friction and discontentment among the populace. In 1942 the Ley

de Ocupantes en Precario (Squatters's Law) provided for government acquisition of lands squatted on, their distribution among the squatters, and compensation of injured parties with public lands of equal value. Although the law was moderately successful in solving the immediate problem, it also had the unintended consequence of alienating very large tracts of 'cheap' public lands in the outlying areas in exchange for small plots in the Central Plateau. Seizing the opportunity, many hacendados of the plateau reportedly went so far as to hire squatters, so as to benefit from the government's compensatory measures.[6/]

Under the influence of the Communist Party, formally established in Costa Rica in 1931, the United Fruit Company became a convenient initial target for the newly founded labor movement. A series of strikes, increasing in severity between 1934 and 1945, involved most sectors of the economy, including white collar workers.[7/]

The crisis period brought forth two major tendencies on the part of the government: 'reglamentismo' (regulation) and 'reformismo'. In 1933, the Junta de Liquidaciones de Cafe put an end to the abuse of small producers by coffee processing plants, and curtailed tax evasion by the same group. This board set the price each beneficiario should pay the producer. It also set a 12 percent profit limit on their operations. At the same time, the quasi-public Instituto Nacional de Defensa de Cafe was established to promote the production and sale of Costa Rican coffee. It was replaced by the wholly governmental Oficina del Cafe in 1948. During the 1930s and 1940s, the Costa Rican government centralized most operations pertaining to

coffee exports. Governmental measures, such as exchange controls, special licensing procedures, protective tariffs, and rent controls were proclaimed in response to the demands of various newly emerging interest groups.

An 8 percent ad valorem tax on coffee exports was established in 1937. Similarly, an ineffectively low, but progressive land tax was initiated two years later. During the administration of Dr. Rafael Angel Calderon Guardia, 1940-44, a Social Security System and the first comprehensive Labor Code were passed; the first low-cost housing and agricultural cooperatives were established; credit was made available to small farmers and poor urban dwellers; a series of amendments of the Constitution provided a social "bill of rights"; renewed government subsidies and liberal enrollment policy permitted the reopening of the University of Costa Rica.[8/]

If the pace of change was not quick enough for some, it was felt too radical by others. The governments of Calderon Guardia and his Partido Republicano successor, Teodoro Picado, gradually lost favor and the ability to maintain order. Charges of the government manipulating the electoral process led to the Revolution of 1948.

The triumph of the revolution placed power in the hands of social-democratic intellectuals and activists under the leadership of Jose Figueres Ferrer. The Junta governed for 18 months before returning power to the legally elected President, journalist Otilio Ulate. During this period, they consolidated the reforms of the previous administrations

and effected a series of important structural reforms which marked the beginning of a new era. These included: abolition of a standing army; women's suffrage; abolition of racially discriminatory laws agains blacks; elimination of property requirements for holding public office; nationalization of the banking system; nationalization of electric power generation;imposition of a 10 percent tax (later revoked) on property valued in excess of 50,000 colones; renegotiation of the United Fruit Co. contract, with the imposition of a 15 percent tax on net profits; a new constitution; important extensions of educational, health, and pension plans; authority for wage and price controls. In short, the process of institution building radically changed and extended the role of the State, permeating the entire fabric of the Costa Rican society.

## E. Summary and Evaluation

The preceding historical analysis of Costa Rica's development showed a country that was clearly in the backwaters of the Spanish colonial empire. Its early growth pattern bears a resemblance to the pattern of growth processes experienced today in many developing countries. Costa Rica is today a "middle-income" country whose income distribution commands attention within the Latin American context. Is there a causal connection between that early growth pattern and the present, relatively equitable distribution pattern? Certain aspects of Costa Rica's political development tend to confirm the existence of such a link, other forces seem to have con-

tributed to this favorable equity position achieved in earlier periods. Although the particulars of Costa Rican history are not transferable to situations in other developing countries, the lessons which can be drawn from its history, both positive and negative with respect to equitable growth, will be of general relevance to other developing nations. Those lessons will be presented in the familiar terminology of the Kuznets hypothesis and the dualistic growth model.

Costa Rica's total population at the time of Independence in 1821 was approximately 70,000 people, over 80 percent of whom resided in the Central Valley. Due to the lack of mineral wealth and in the absence of an indigenous labor force for plantation agriculture and limited external trade, the vast majority lived on family subsistence agriculture. Land was plentiful in relation to the population. One may, therefore, confidently assert a highly equitable distribution of income and of assets at that time, certainly in comparison with the more highly developed areas of the Spanish empire as Mexico, Guatemala, Colombia or Peru. Undoubtedly, per capita GNP among these latter countries far outstripped that of Costa Rica.

The Costa Rican economy at that time may be characterized as a one sector agricultural economy located somewhere on the high equity,

low-income portion of the Kuznets curve. The principal factors of production were labor and land, the former being in short supply with respect to the latter under the prevailing technology. Private savings were low.

Coffee production, in comparison with the production of annual subsistence crops or of livestock, may be viewed as a highly capital-intensive activity, requiring machinery and fixed installations. Furthermore, the slow-growing and small-sized coffee tree calls for considerable expenditures on land preparation, shade management, and weed control over a period of four to five years just to bring a plantation to productive age. These expenditures as well as the opportunity cost of diverting land from other production over this period constitute other elements of the value of the capital stock which the producing plantation represents. We have noted the role of public and external savings in financing the investment in coffee production in Costa Rica. Foreign savings in particular were rather selectively distributed.

Although the structure of production remained agricultural, the commercialization of coffee introduced a second sector to the Costa Rican economy, distinct from the traditional agricultural sector in its capital intensity, financial organization, and export orientation. Its rapid growth took place in the absence of significant linkages to the traditional sector other than through the displacement of land and labor from production for domestic consumption. The surpluses, generated within the coffee sector, were largely "leaked" from the domestic

economy through the rapid expansion of imports from the industrializing countries.

The transition to dualism provides a simple but useful framework for tracing its effects on the distribution of income. It should be pointed out that the transition does not imply impoverishment in absolute terms, or that such impoverishment is a necessary feature of the general case. Rather, the case of Costa Rica is thought of to provide an illustration of how rapid growth may be accompanied by movement from a highly equal distribution of income to one which has significantly deteriorated in relative terms. In our case, the linkages between growth and distribution are all too evident.

Differences in the functional distribution of income between the traditional sector and the expanding coffee sector may be described in neoclassical terms. Within the traditional or non-coffee sector, returns to the two factors of production - labor and land - accrued directly and almost exclusively to the producing family units. Coffee introduced a third factor of production -- capital -- and, through the institution of hired labor, freed farm size from the constraints imposed by family size. The availability of capital was restricted to a relatively small number of persons, for the institutional reasons described above. Concentration of capital permitted the process of concentration of factor ownership among individuals and resulted in an unequal distribution of factor incomes among households, which in turn reinforced the process of concentration of factor ownership.

Coffee production and exports grew at an average rate of a little under 4 percent per year between 1854 and 1901. Production was initially concentrated in the Central Valley within the Metropolitan Subregion and then from the Central Valley as a whole. This outward movement can be attributed to the displacement of traditional sector farm families by the expanding coffee sector. However, a combination of an open agricultural frontier on the fringes of and beyond the Central Valley (which effectively absorbed a large number of displaced farmers) and of strong demand for labor within the growing coffee sector, prevented the decline in absolute terms of incomes within the traditional sector until the early 1900s. Subsequently, the dramatic decline in coffee prices and production during the first two decades of this century caused widespread unemployment for the first time in Costa Rican history; this had severe impact on the incomes of the poor in both relative and absolute terms.

Costa Rica's experience confirms the view that equity in development is determined not so much by rate of growth as by the type of growth process which characterizes the early stages of development. The growth pattern, established early in the development process, determines capital formation, types of production and levels of consumption, which in turn affect income distribution. The institutional framework, as in the case of finance and marketing in the development of Costa Rica's coffee production, may have had a decisive impact

on the structure of capital formation. Thus, linkages among the "leading" sector and other sectors have an important influence on the distribution of income. Finally, the stability of markets and of employment is essential to avoid the absolute deterioration of the position of the poor.

Other growth processes, similarly subject to external shocks, occurred in the rest of Central and Latin America during this period. Whereas Costa Rica began with, and, to some extent, built on a highly equitable initial distribution of assets, these had been highly concentrated from the beginning in many other countries. All, it is believed, suffered from further concentration through the process of dualistic and primary-export oriented growth during the 19th and early 20th centuries. In some, this process appears to continue. Costa Rica had a comparatively favorable distribution of income in 1958, in large part because of its unique initial conditions. To a significant, if unmeasurable extent, it can be assumed that the social ethic born of those initial conditions has continued to influence Costa Rica's political development, fostering the establishment of policies and programs which helped to maintain a stable distribution of income during the modern period of continued rapid growth. A description of the implementation process of these programs and policies will be the subject of section III.

## III. PUBLIC SECTOR PROGRAMS - 1960 THROUGH THE EARLY 1970s

Information on the development of basic infrastructure, housing, education, health services, social programs, wage, employment and investment policies is presented to show the steady improvement of public services. Because of space limitations, a formal analysis of the contribution of public sector programs cannot be made here. However, the view prevails that this contribution has been a positive one. To the extent possible, an attempt is made to assess the equity implications of public sector activity in Costa Rica during this period. Where appropriate, comparative data for other Central American countries are included in this discussion.

### A. Physical Infrastructure

#### 1. Roads

Between 1964 and 1973, Costa Rica increased the length of its road network (including all types of surfaces) from 16,060 to 23,091 kilometers. This means that by 1973, Costa Rica achieved an average road density per square kilometer of territory of .456k/k2. This compares with .09, .52, .05 and .12 for Guatemala, El Salvador, Honduras and Nicaragua, respectively. The road density figure per 1,000 of population was 12.2 for Costa Rica in 1973, as compared with 1.8, 2.9, 2.0, and 5.8 for the other above cited Central American countries. In absolute terms, Costa Rica had at that date approximately four times the

total length of roads of Honduras, and approximately twice that of the remaining three countries. With the exception of El Salvador, which has only 18,742 square kilometes, Costa Rica is only half the size of the other Central American countries.[1/]

Though the conditions of Costa Rican roads do not always meet desired standards, enlargement of the road network has fostered a more balanced regional development. While the unintended effect of opening previously inaccessible areas may have been a certain concentration of land and income in a given area, the new roads have had an overall positive impact on interregional incomes. Increased mobility and better communication among the regions has reduced interregional income disparities and contributed to a net reduction of income inequality in Costa Rica.

2. Electricity

Costa Rica leads in the generation of electricity in Central America. Its generating capacity has increased from 113.4 to 362.0 MW between 1960 and 1973, reaching 190 watts per capita of installed capacity in the latter year. Nicaragua, in second place, achieved the figure of 120 watts per capita in 1973.[2/]

Insufficient information on the impact of investment in electricity generation on the growth of production and on income, particularly with respect to rural areas, precludes an assessment of its effects on the

distribution of income. However, when viewed as a valued consumption good, the percentage of households enjoying electricity increased from 54.6 to 66.3 between 1963 and 1973, with most of this growth occuring in the rural areas where service was extended from 31.6 to 43.7 percent of households. (see table 18).

The World Bank reports that rural coverage was further increased to about 55 percent by 1977. The USAID - Academia de Centroamerica poverty profiles study, La Pobreza En Costa Rica, indicates that public services, including potable water, sewer, and electric connections are apparently accessible to poor and nonpoor alike within urban areas. However, during a recent evaluation of AID Rural Electrification projects in Costa Rica and Colombia, Davis et al. found that income was a significant differentiator between users and non-adopters within electrified rural areas of Costa Rica.[3/]

Electricity rates in Costa Rica are the lowest in Central America due largely to the predominance of hydroelectric generation. Though the Costa Rican electric authority (ICE), has incurred heavy foreign indebtedness to finance expansion and distribution capacity, a comfortable operating surplus has been maintained in recent years. The provision of electricity to virtually all urban residents, regardless of income, and the steady and continuing progress of rural electrification, reflects quite favorably on public sector performance in Costa Rica as compared to its Central American neighbors.

### 3. Housing

The Instituto Nacional de Vivienda y Urbanismo (INVU) is the principal housing and urban development agency of the Costa Rican government. Since its inception in 1954, INVU has built approximately 20,000 houses and provided supervised credit for an additional 12,600 shelter solutions. INVU activities have only in recent years expanded to include rural areas. At present, for example, it is well into the implementation phase of a $15 million CABEI-financed project, three-fourths of which is directed at financing low-cost rural housing. While clearly a deficit of acceptable housing persists, considerable progress has been made in the housing sector (see Table 3).

In 1973, approximately 11 percent of the housing stock of the San Jose Metropolitan area had been built through public financing. Of these, 87.1 percent were owner-occupied, as compared with 45.3 percent of privately built housing. Wage and salary income per month among the occupants of public housing averaged 758 colones, as compard with 912 colones among the occupants of private houses. These figures may be compared with an average wage and salary income of 822 colones per month for the Province of San Jose (including rural areas) during that Census year. Thus, while the dispersion of salaries among the residents of private housing ranges from 331 to 2,558 colones per month, the dispersion of salaries among the residents of public housing ranges from

**Table 3. Indicators of Housing Conditions in Costa Rica, 1963-73**

| | Percent of households | | | | | |
|---|---|---|---|---|---|---|
| | Total | | Urban | | Rural | |
| Indicator | 1963 | 1973 | 1963 | 1973 | 1963 | 1973 |
| Condition: | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 |
| Good | 31.6 | 53.8 | 48.6 | 63.8 | 21.5 | 46.0 |
| Fair | 34.4 | 32.7 | 33.0 | 26.1 | 25.3 | 37.9 |
| Bad | 34.0 | 13.5 | 18.4 | 10.1 | 43.2 | 16.1 |
| Tenure: | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 |
| Owned | 56.3 | 60.3 | 43.0 | 53.3 | 64.1 | 65.6 |
| Rented | 24.0 | 22.9 | 48.9 | 40.0 | 9.3 | 9.8 |
| Other | 19.7 | 16.8 | 8.1 | 6.7 | 26.6 | 24.6 |
| Services: | | | | | | |
| Electricity | 54.6 | 66.3 | 93.5 | 95.6 | 31.6 | 43.7 |
| Water: | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 |
| Piped | 68.3 | 78.2 | 97.7 | 98.2 | 51.0 | 62.9 |
| Other means | 21.1 | 8.0 | 0.6 | 0.8 | 33.2 | 13.5 |
| Don't have | 10.6 | 13.8 | 1.7 | 1.0 | 15.8 | 23.6 |
| Bath: | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 |
| Piped | 57.0 | 72.4 | 93.7 | 96.3 | 35.4 | 54.1 |
| Other means | 5.6 | 5.3 | 0.6 | 0.9 | 8.6 | 8.7 |
| Don't have | 37.4 | 22.3 | 5.7 | 2.8 | 56.0 | 37.2 |
| Sanitary facilities: | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 |
| Sewer | 13.2 | 14.8 | 34.4 | 33.2 | 0.6 | 0.7 |
| Septic tank | 16.6 | 29.4 | 29.0 | 43.1 | 9.2 | 18.9 |
| Concrete privy | 19.0 | 27.3 | 19.6 | 16.0 | 18.7 | 36.1 |
| Wooden privy | 24.7 | 16.3 | 13.5 | 5.9 | 31.4 | 24.2 |
| Other types | 1.0 | 1.1 | 1.4 | 0.8 | 0.8 | 1.3 |
| Don't have | 25.5 | 11.1 | 2.1 | 1.0 | 39.3 | 18.8 |
| Radio | 54.2 | 77.0 | 74.3 | 82.4 | 42.4 | 72.8 |
| Television | 6.4 | 36.8 | 14.9 | 61.6 | 1.3 | 17.8 |

Source: Dirección General de Estadística y Censos, 1963-73.

378 to 1,336 colones, indicating that the very poorest families of the San José Metropolitan Area remain beyond the reach of public sector housing programs.[4/]

B. Human Resources Programs

1. Education

Early and continued sector support of education has produced remarkable results in decreasing the illiteracy rate in Costa Rica. Today, Costa Rica's school age and adult population is approximately 90 percent literate. This compares favorably with literacy averages of about 55 percent in the other Central American countries.

Per capita expenditures on public education in Costa Rica was almost double the average level of expenditures in the other Central American countries in 1966 (see table 4). By 1973, the ratio had risen to approximately 3 to 1. Table 20 reflects this trend from the viewpoint of central government budgetary allocations. By 1977, according to IBRD estimates, 32.7 percent of central government expenditures was spent on education.

2. Health

Public sector activities relating to health services are mainly conducted through two institutions: (1) the Ministry of Health and, (2) the Caja Costarricense de Seguro Social (CCSS), the Costa Rican social security administration.

**Table 4.** Per Capita Expenditures on Public Education in Central America

(U.S. dollars)

| Year | Guatemala | El Salvador | Honduras | Nicaragua | Costa Rica |
|---|---|---|---|---|---|
| 1966 | 4.48 | 7.04 | 7.10 | 6.94 | 13.97 |
| 1967 | 4.61 | 7.19 | 6.83 | 8.36 | 16.15 |
| 1968 | 4.79 | 7.58 | 7.09 | 8.61 | 17.31 |
| 1969 | 5.84 | 8.03 | 7.69 | 8.25 | 20.27 |
| 1970 | 5.89 | 8.03 | 7.69 | 8.25 | 20.55 |
| 1971 | 6.00 | 12.16 | 9.00 | 9.51 | 23.28 |
| 1972 | 6.23 | 11.61 | 9.63 | 10.13 | 26.16 |
| 1973 | 7.35 | 11.98 | 10.13 | 10.18 | 31.79 |

Source: SIECA -- VI Compendio Estadístico Centroamericano, 1975.

Table 5. Costa Rica: Percent of Public Expenditures Devoted to Education, 1951-75

| Year | Percent | Year | Percent |
|---|---|---|---|
| 1951 | 15 | 1966 | 26 |
| 1957 | 16 | 1967 | 28 |
| 1958 | 18 | 1968 | 28 |
| 1959 | 20 | 1969 | 28 |
| 1960 | 20 | 1970 | 28 |
| 1961 | 20 | 1971 | 27 |
| 1962 | 21 | 1973 | 25 |
| 1963 | 21 | 1974 | 31 |
| 1965 | 25 | 1975 | 31 |

Source: OFIPLAN; Central Bank; IBRD; IDB

Since 1941, the CCSS has been responsible for the administration of the Sickness and Maternity Insurance Fund. This fund finances prescriptions, medical and dental services for workers and dependents directly from the CCSS. In addition, the fund provides sickness and maternity benefits in the amount of 50 percent of salary for a period of six months in case of illness and two months for maternity.

As of 1976, 62 percent of Costa Rican workers and their families, constituting 76 percent of the population, were covered through this program. Current plans project full medical coverage of the workforce by 1984, along with expanded coverage for the self-employed,

The CCSS also administers a Disability, Retirement and Death Fund. Retirement benefits may begin at 60 years of age and range to a maximum of 8,000 colones per month, depending on the amount and length of time of contributions. Benefits for disability are calculated on the same basis as retirement benefits and are awarded when a worker loses "two-thirds of his working capacity". Payments to the spouse and children are approximately 50 percent of the pension that corresponded to the insured. As of 1976, this fund covered 50 percent and 62 percent of the labor force and of the population respectively. Plans call for continued expansion of coverage and for review of the incidence of contributions and benefits paid, with a view to their more equitable apportionment. In addition, the CCSS has assumed responsibility for the integrated administration of the country's hospital system to increase

operating efficiency and to balance the system on a regional basis.

By 1965, Costa Rica had approximately 420 hospital beds per 100,000 population available, a figure more than double the average of the other four Central American countries. Per capita expenditures on health and social security in Costa Rica are double the expenditures of other countries in Central America.

As a result, progress has been achieved in reducing mortality from vaccine-preventable diseases and from diarrheas, a leading cause of death among developing-country infants and children. Adult death rates have continued to decline dramatically due to environmentally oriented programs, such as malaria eradication and the improvement of potable water supplies (see Table 6).

Table 6. Costa Rica: Demographic Indicators, 1927-1970

| Year | Birth | Death | Natural growth | Mid-year population (1,000) | Population growth rate |
|---|---|---|---|---|---|
| 1927 | 47.1 | 24.0 | 23.1 | 489 | -- |
| 1930 | 46.1 | 23.6 | 22.5 | 523 | 2.3 |
| 1935 | 43.7 | 23.9 | 19.8 | 581 | 2.1 |
| 1940 | 43.7 | 18.8 | 24.9 | 654 | 2.4 |
| 1945 | 44.9 | 16.0 | 28.9 | 740 | 2.5 |
| 1950 | 45.2 | 12.5 | 32.7 | 859 | 3.0 |
| 1955 | 48.9 | 10.7 | 38.2 | 1,028 | 3.7 |
| 1960 | 47.5 | 8.9 | 38.6 | 1,254 | 4.0 |
| 1965 | 42.3 | 8.6 | 33.7 | 1,490 | 3.5 |
| 1970 | 33.2 | 6.6 | 26.6 | 1,729 | 2.8 |

Source: Costa Rican Demographic Association and IBRD staff estimates

Costa Rica's rural health program involves education, improvement of housing and potable water supplies, construction of latrines and sewers, and expansion of medical services. The rural areas of the country have been divided into sections of 150 square kilometers containing a minimum of 200 to a maximum of about 500 families. Each zone has a Puesto de Salud Rural staffed by a nurse and a medical technician who visit each home every 3 to 4 months. Their tasks are to take care of routine medical problems, vaccinate and deparasitize, identify deficiencies in housing, water supply etc., and impart notions of hygiene, nutrition, and of preventive medicine. Cases of serious illness are referred to regional or specialized national hospital centers.

Table 7 provides a timetable by which the early implementation phases of the Rural Health program have been completed.

3. Asignaciones Familiares

The Programa de Desarollo Social y Asignaciones Familiares , as originally conceived under the Figueres administration, consisted of two major parts.

1. A direct income transfer to the poorest and largest families of the country.

2. An obligatory savings plan to which both employer and employee contribute.

As an income transfer mechanism, this program was designed to meet the needs of large families whose income was totally inadequate in pro-

Table 7. Costa Rica: Rural Health Program Indicators, 1974-1977

| Item | 1974 | Percent Dispersed Population | 1975 | Percent Dispersed Population | 1976 | Percent Dispersed Population | 1977[a] | Percent Dispersed Population |
|---|---|---|---|---|---|---|---|---|
| Population coverage | 200,000 | 30.76 | 360,000 | 55.38 | 490,000 | 75.38 | 650,000 | 97.00* |
| Communities served | 1,250 | | 2,240 | | 3,104 | | 3,840 | |
| Households served | 48,800 | | 84,000 | | 116,400 | | 144,000 | |
| Buildings constructed | 30 | | 28 | | 32 | | 113 | |
| Rural health posts: | 78 | | 140 | | 194 | | 240 | |
| Training: | | | | | | | | |
| Nursing aides | 90 | | 27 | | 55 | | 85 | |
| Rural health assistants | 80 | | 34 | | 67 | | 70 | |
| Health promoters | — | | 169 | | — | | — | |

a. 1977 estimates * estimate
Source: Ministry of Health, 1976 Annual Report.

viding proper care for their dependents. President Figueres intended, therefore, to gauge the levels of these monetary transfers not only by some basic income level, but by the number of dependents contained in the beneficiary's family. This payment was to be made to mothers in explicit recognition of the social contribution of women in household labor and in child rearing.

Underlying the obligatory savings plan was the consideration that employer contribution to this fund would eventually replace the employer's obligation to maintain fixed deposits for covering potential separation payments. It was intended to provide workers upon retirement, and in addition to social security benefits, with a lump sum payment that might enable them to acquire some property.

Substantially modified, the enabling legislation was passed in December 1974 during the administration of President Oduber. A fund was created for purposes of the program which is financed by 37.5 percent of sales tax revenues (the sales tax is presently 8 percent in Costa Rica), and by a payroll tax which will reach a maximum of 5 percent in 1978. It is estimated that in 1978 the fund will have approximately 2.5 percent of national income at its disposal. Tables 8 and 9 break down revenues and expenditures of the program, with projections through 1982. This income, it is hoped, will be transferred mainly to the poorest 20 percent of the population. This goal, if met, constitutes a 30-40 percent increase in the per capita income perceived by this group. The

impact both in terms of basic needs and of equity will be considerable.

Working through established government agencies such as the social security system, the land reform institute, the vocational training institute, the agricultural production council, the ministries of health, agriculture, and public works, as well as through various social assistance and community development agencies, this fund serves the following activities:

(1) to provide pensions for indigents who never paid into the social security system.

(2) to contribute to health and disability insurance for self-employed workers earning less than 1500 colones a month.

(3) to increase the ITCO's capabilities to purchase new lands, to settle and to provide technical assistance to new settlers.

(4) to expand the activities of the Instituto Nacional de Aprendizaje, the vocational training institute.

(5) to finance mother and child nutrition, health services and educational programs in rural areas.

4. Nutrition

The effectiveness of Costa Rica's nutrition program is subject to considerable debate. The controversy centers on the inappropriate use of standards and criteria measuring degrees of malnutrition in Costa Rican children aged four and younger. An INCAP survey taken in the late 1960's using weight-for-the-age criteria, (as developed by Gomez et al.)[5/] and utilizing Iowa growth curves as basis for comparison, showed that

Table 8. Asignaciones Familiares — Funding by Sources, 1977-1982

(Millions of current colones and percentages)

| Funding | 1977 | 1978 | 1979 | 1980 | 1981 | 1982 |
|---|---|---|---|---|---|---|
| Total: | 391.6 | 532.2 | 602.0 | 689.9 | 794.2 | 914.2 |
| 37.5 percent of the sales tax | 225.7 | 270.8 | 298.5 | 338.8 | 387.9 | 444.2 |
| 5 percent of payroll tax | 164.2 | 260.3 | 300.8 | 348.8 | 402.7 | 465.9 |
| Other income including interest | 1.7 | 2.3 | 2.7 | 3.1 | 3.6 | 4.1 |
| | ----------Percentage distribution---------- | | | | | |
| Total: | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 |
| 37.5 percent of the sales tax | 57.3 | 50.8 | 49.6 | 49.1 | 48.8 | 48.6 |
| 5 percent of payroll tax | 42.3 | 48.8 | 50.0 | 50.4 | 50.7 | 51.0 |
| Other income including interest | 0.4 | 0.4 | 0.4 | 0.5 | 0.5 | 0.4 |

Source: División de Planes y Política Exconómica, OFIPLAN.

Table 9. Asignaciones Familiares — Percentage Distribution of Expenditures, 1978-1982

| | Activity | 1978 | 1979 | 1980 | 1981 | 1982 |
|---|---|---|---|---|---|---|
| A. | Nutrition and feeding | 49.8 | 48.0 | 48.0 | 48.0 | 47.7 |
| B. | Rural health | 6.3 | 6.0 | 6.0 | 6.4 | 6.4 |
| C. | Low-cost housing | 16.7 | 20.8 | 20.0 | 20.0 | 20.0 |
| D. | Direct family and child assistance | 3.1 | 3.0 | 3.8 | 3.4 | 3.5 |
| E. | Noncontributing pension fund and health insurance for self-employed workers | 20.0 | 20.0 | 20.0 | 20.0 | 20.0 |
| F. | Training programs in poverty areas | 1.9 | 1.0 | 1.0 | 1.0 | 0.9 |
| G. | Asignaciones familiares | 0.1 | 1.0 | 1.0 | 1.0 | 1.1 |
| H. | Campesino settlements | 0.2 | n.d. | n.d. | n.d. | n.d. |
| I. | Other activities | 2.0 | 0.2 | 0.2 | 0.2 | 0.2 |
| TOTAL | | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 |

Source: OFIPLAN, El Desarrollo Economico-Social de Costa Rica en el Periodo 1978-1982, San José, April 1978.

57 percent of children in this age group suffered from some degree of malnutrition. Recent research, however, indicates that a more realistic measure is the weight-for-height criterion. In using the latter criterion, a subsequent survey revealed the prevalence of malnutrition of about 23 percent of children within the same age group. Since the survey utilized U.S. standards of comparison and did not take into account possible genetic differences, the extent of real malnutrition may still be overstated. As reported in USAID Nutrition Assessment for Costa Rica (1975), the Ministry of Health conducted another nutrition survey in 1975, reporting 53 percent malnutrition. Again, the results were based on the Gomez/Iowa criteria. The AID Assessment notes that "the imported methods used to measure malnutrition may be considered unrealistic in the Costa Rican context."[6/]

Specialists in the field contend that most cases of malnutrition occur among that 10 percent of the population living outside the 200 families/150 square kilometer zones covered by the Asignaciones program and among families where mothers neglect breast feeding and proper infant care. Because of the shortcomings and limitations, the Asignaciones Familiares program may not be the most effective mechanism in combatting malnutrition.

The food program for schoolchildren, infants, pregnant and lactating mothers, may be viewed as an in-kind income transfer mechanism. Though

this program is less efficient in reaching the target group and more costly than a direct monetary transfer system, the free food program will undoubtedly have important distributional effects.

C. Others

1. Land Reform

The land reform institute (ITCO), has gained new vitality in recent years. Legislation passed in 1975 provides for a permanent operating budget of about $18.5 million a year for financing the settlements of about 2000 poor families per year on ITCO lands. Lands already purchased and in various stages of development total approximately 800,000 acres. Funds for the acquisition of new lands, as they are needed, will be available through Asignaciones Familiares.

Two fundamental shifts in emphasis with regard to land reform have taken place. First, we have the shelving of the so-called policy of 'colonizacion', through which families were settled on virgin lands in remote areas of the country. This policy of the forties and fifties proved to be a failure due to the lack of complementary inputs, such as roads, credits, technical assistance, etc., and due to the insufficient funding with which ITCO was expected to operate during this period. Partly in response to aggravation of the squatting problem, ITCO now bases its strategy on the acquisition of lands of proven agricultural value, and in areas where infrastructure is adequate.

Secondly, in coordination with other government agencies, ITCO is now in a position to provide assistance in the areas of crop financing, housing, roads, education, health and sanitation, cooperative development and agricultural extension service. A complementary strategy embodied in a pending ITCO legislative proposal is an increase in the effective rate of land taxation, and a change in the method of assessment from a value to an owned-area basis. This is to avoid castigating fixed investment while discouraging underutilization and speculation in land.

2. Wages Policy

Minimum wages for over 450 occupational categories are administered by the Costa Rican Ministry of Labor. Wages are set, category by category, through periodic negotiations between representatives of the government, of labor and of management. Without more than a passing question in regard to the suitability of such a complex system, an example of recent minimum wage policy during the 1974-75 interlude of inflation is given below. It should be seen as an indication of the government's sincere commitment to a policy of gradual redistribution.

Inflation resulted in a decline in the average real wage of about 3 percent a year for both 1974 and 1975, implying a total fall to about the 1970 real wage level. In order to reduce the disparity in wage rates and income distribution, and to assist the lowest income groups hardest hit by inflation, the government adopted a policy of increasing minimum

wages in inverse proportion to their previous level. The disparity in the rates of adjustment was very large indeed, ranging from 41 percent for the lowest rates to 10 percent for the highest. While such differentials could not be maintained as permanent policy, a significant reduction in the disparity of wage rates was apparently accomplished across a wide range of industries. While actual wages paid varied more or less from minimum rates, Table 10 reflects the order of magnitude of the changes involved. Figures 3 and 4 document the courses of prices and wages graphically. Of particular interest is the relation of minimum wages in agriculture to those in the services and commercial sectors.

Table 10. Costa Rica: Ratio of Highest to Lowest Minimum Wage - Various Industries, 1972 and 1976

| | Ratio of highest to lowest minimum wage | |
|---|---|---|
| | July 1972 | January 1976 |
| Fine bakery goods | 1.66 | 1.35 |
| Bread bakeries | 1.80 | 1.55 |
| Noodles and pastas | 1.50 | 1.33 |
| Breweries | 1.43 | 1.25 |
| Shoes | 1.27 | 1.16 |
| Textiles | 2.31 | 1.69 |
| Sawmills | 1.44 | 1.27 |
| Furniture | 1.65 | 1.39 |
| Printing | 3.40 | 2.30 |
| Rubber | 1.95 | 1.54 |
| Mechanics | 1.76 | 1.45 |
| Sugar mills and refineries | 1.39 | 1.24 |
| Chocolates and candies | 1.35 | 1.22 |
| Weaving mills | 1.21 | 1.15 |
| Soaps and detergents | 1.21 | 1.13 |
| Tanneries | 1.18 | 1.15 |
| Electrical shops, etc. | 1.42 | 1.28 |
| Construction | 1.63 | 1.36 |
| Railroads | 2.30 | 1.75 |

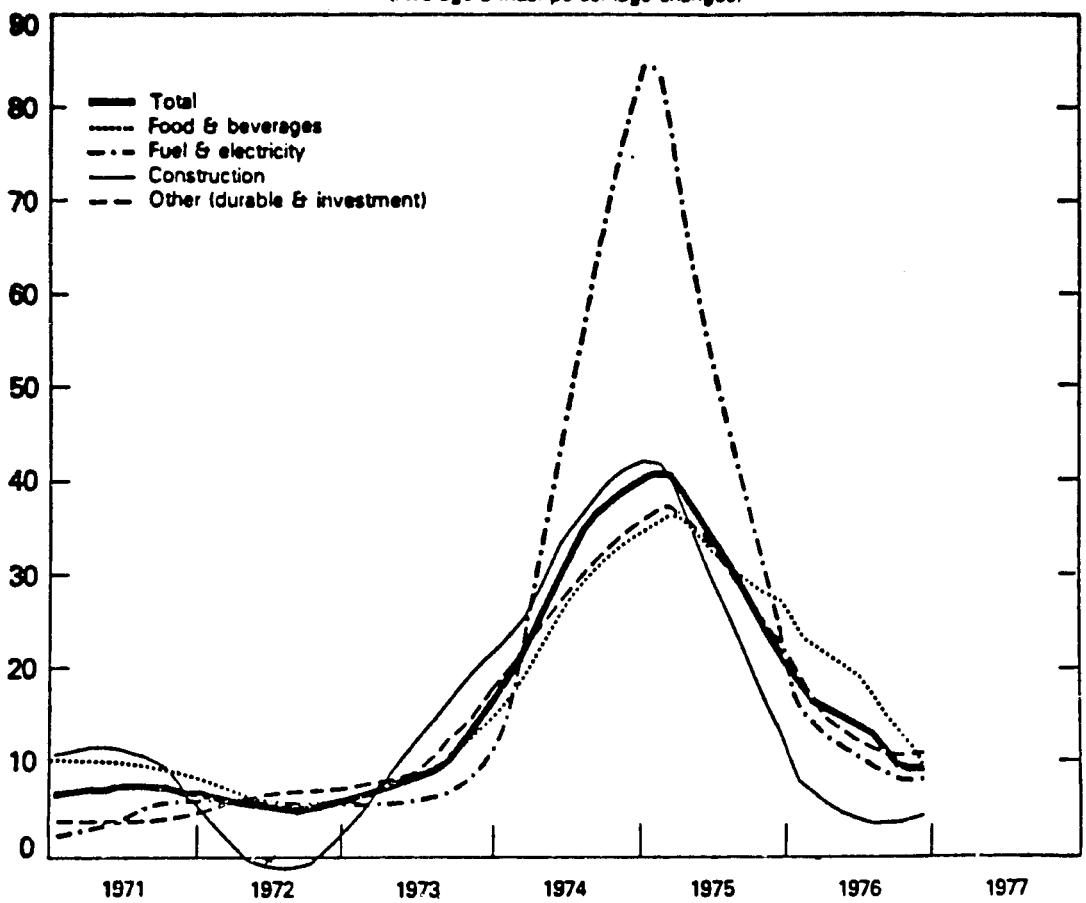
Source: Gregory, P., Estudio Sobre Políticas de Salarios y Redistribución de Ingreso en Costa Rica, PREALC, 1976.

FIGURE 3.

COSTA RICA

WHOLESALE PRICES

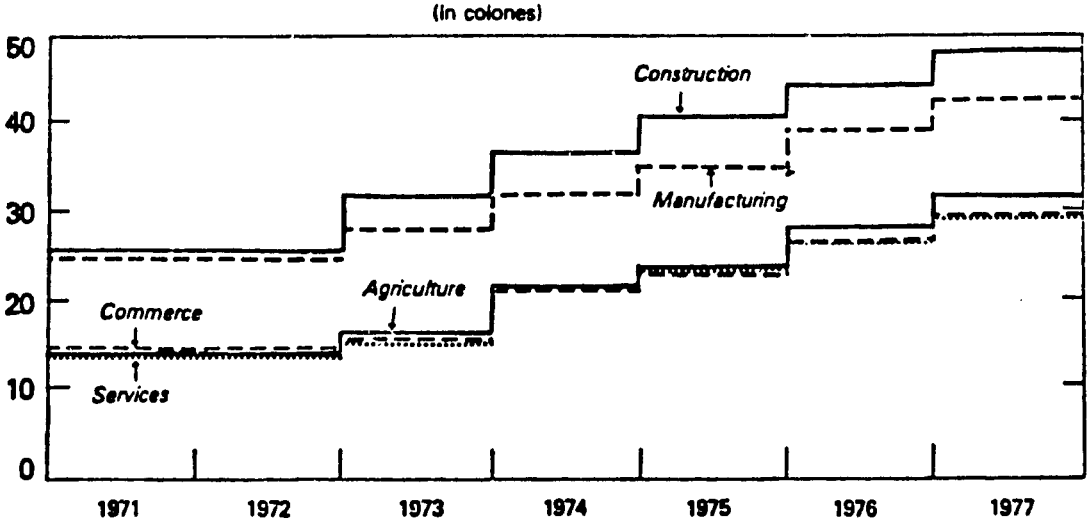
(Average annual percentage changes)




SELECTED MINIMUM DAILY WAGES

FIGURE 4.

(in colones)




Sources: Central Bank of Costa Rica; and IMF

## IV. ISSUES AND ALTERNATIVES FOR EQUITABLE GROWTH

Costa Rica has indeed made remarkable progress in terms of economic and social development. This concluding section will focus on key areas of attention for the continuation and enhancement cf a basic-needs oriented growth strategy.

Perhaps the most useful work to date on poverty in Costa Rica is that performed by USAID/CR and La Academia de Centro America culminating in the publication La Pobreza en Costa Rica (San José, 1977).

Making use of data collected for the 1973 Population and Agricultural Censuses, supplemented by survey and other materials, this effort attempted to develop comprehensive poverty profiles documenting such characteristics as family size, dependency ratios, employment, education, fertility, and location of poor and non-poor families. It, of course, also attempted to determine the numbers of poor families located in the various regions of the country.

Using the AID standard of 150 (1969 US dollars and equivalent to about $265 in 1978) per capita as a poverty line, it was determined that between one quarter and one half of the 331,000 Costa Rican censal families were 'poor' in 1973. The variation of this estimate is due to variations in imputation procedures used for estimating income equivalents of owned housing, land-ownership, access to firewood, etc. A figure in the neighborhood of 30 percent, equivalent to about 100,000 families,

is probably correct, as is indicated by the results of the second National Public Opinion Survey, published in 1977, which reported that 70 percent of the population expressed being either satisfied or very satisfied with their income.[1/] According to a recent USAID Urban Sector Assessment, approximately 20 percent of San José Metropolitan Area families fall below a comparable per capita income level of $269 1977 US$.

Whatever the definition of poverty and the exact number of the poor in Costa Rica, it is clear that a sizable and important human problem exists. Fortunately for purposes of analysis, the characteristics of poor versus non-poor families are relatively invariant with respect to the methodological discrepancies described above in relation to the problem of measuring their number. The salient differences among these characteristics are summarized below.

1. Approximately 75 percent of all poor families are rural and about two-thirds of these are landless.

2. Unemployment is over three times higher (14 percent vs. 4 percent; 6 percent overall in 1973) among the poor than among the non-poor. The urban poor suffer an unemployment rate of 26 percent, while landless rural poor are 16 percent unemployed. Unemployment among poor urban males reached 33 percent.

3. Average family size is higher among the poor (6.6) than among the non-poor (5.4). The dependency ratio (ratio of the number of family members of a dependent age to number of potentially active age) is substantially higher (1.53 vs. .75). In other words, the average poor family contains from 4 to 5.6 dependents, while the average non-poor family contains only from 2.3 to 4.4.

4. As would be expected from 2. and 3. above, we find that on an average 1.1 people per poor family form part of the labor force, while 1.8 do per non-poor family. Among the urban poor, this number falls to .9.

5. Illiteracy is considerably higher among poor families (15 percent) than among non-poor (9 percent). In urban areas this difference is 9 percent versus 3.5 percent while it is 17.5 percent versus 13.5 percent in the rural setting. Employment and income are much more closely correlated to the level of educational achievement in urban than in rural areas.

Even at this general and summary level, the poverty profiles abstracted above provide clear guidelines and priorities for the formulation of an equity and/or basic needs-oriented development strategy.

Very broadly, the major problems of the poor within this growing and dynamic society seem to be as follows:

1. Rural-urban imbalance, accentuated among the rural poor, in access to productive assets, employment and markets.

2. In all areas, but most critically among the urban poor, deficient access to employment, in both quantity and quality terms.

3. Extraordinary dependency burden.

4. Access to education.

Such a broad statement cannot be complete and conceals a great deal of complexity, but does provide the necessary priorities and design parameters required for the selection of a development program which can alter the nature of economic growth in a way which will involve and favor, rather than bypass, the poor. We refer once again to the schematic of Basic Needs Oriented Development Policies presented in Chapter 1 as a framework for the discussion of these key problem areas.

Rural-Urban Imbalance

Policy areas 1 through 7 are directly relevant to addressing the problem of rural-urban imbalance, and of inequity within the rural sector.

In the area of asset distribution we have seen that considerable scope exists for improving access to land among the rural poor. (Considerable detail on the distribution of land and agricultural production in Costa Rica is presented in Annex B). Similarly, access to infrastructure such as roads, power, water, health, and communications installations, as well as housing, could be much improved in the rural areas of Costa Rica.

In terms of organization, while Costa Rica has enjoyed remarkable success in developing, with government assistance, effective private sector institutions such as producer cooperatives and credit unions, considerable scope exists for decentralizing public sector activity and strengthening the role of local government in planning, resource mobilization and allocation.

With respect to pricing, particular attention should be given to protecting the agricultural terms of trade. As has been demonstrated by Adelman-Robinson policy experiments for Korea,[3/] these may be adversely affected through the uncritical management of, for example, agricultural production policy, which, if these are permitted to deteriorate to any great extent, can bring about severe consequences in terms of income distribution and poverty.

Employment

Employment creation in the rural areas should pay particular attention to off-farm employment, for the following reasons. First, there are practical limits to the rate at which land redistribution can take place. Second, even though redistribution of land can moderate the displacement of farm labor and increase the average productivity of land in the short run, in the long run it is the producivity of labor (and, hence, the potential return to labor) that matters most. Technological change can accomplish a certain amount, perhaps triple, labor productivity without a shift in factor proportions, but, in the long run, farms will need to achieve certain minimum land-to-labor and capital-to-labor ratios if agricultural incomes are ever to approach parity with urban incomes. As population grows, this will entail displacement of labor from the land for purely technological reasons. Furthermore, there is reason to believe that rural-urban migration and urbanization respond to powerful social as well as economic drives. These are processes which may be moderated but are not likely to be reversed in the developing countries.

Agroindustrial and domestic natural resource-based development are leading candidates for creating employment in rural population centers. The rate at which labor-intensive technologies are replaced by capital-intensive ones is, of course, critical to the management of the employment-productivity-incomes tradeoff in both farm and off-farm production.

The small size of the domestic Costa Rican market as well as the low price and income elasticities of agricultural products argue in favor of increasing the export orientation of agroindustrial and agricultural production.

Urban and rural employment can be significantly increased by reducing as much as possible, within the context of the Central American Common Market, the extent of public subsidy and protection of capital-intensity in manufacturing; by eliminating strong biases in credit and fiscal policy which favor "non-traditional" as opposed to "traditional" industries; by reviewing government policy with respect to private foreign investment which has tended to introduce a large-scale and capital-intensive bias to Costa Rican industrial development often at the expense of small local manufacturers; by providing incentives to industries with a high degree of domestic linkage; by stimulating production for export to traditional as well as non-traditional markets; and by increasing the domestic value-added of exports.

Tables 11 and 12 document the phenomenal growth of Costa Rican non-agricultural exports following entry to the Central American Common Market in 1963. Import-substitution domestically, and exports to the CACM have been the basis for Costa Rica's industrial development over this period. However, as is indicated in Table 13, this has been accompanied by heavy displacement of local producers by foreign investors and considerable concentration

of industry accompanied by a tendency towards inappropriate capital-intensity. (See pages 61, 62 and 63)

As of 1972, and according to the 4 digit Uniform International Classification system, production in 78 industrial categories was taking place in Central America. Firms representing 65 categories were operating in Costa Rica. In 33 of these categories, at least 50 percent of total national output corresponded to the largest firms, while in 37 categories over 90 percent of total output corresponded to the four largest firms.[4/]

The creation and maintenance of sufficient employment of sufficient quality -- while respecting the objectives and constraints of maintaining stability, participation, and sustainability -- is undoubtedly the fundamental challenge to be met in attaining equitable growth in Costa Rica.

An example of the complexities involved is provided by the Asignaciones Familiares Program. As has been noted, this is a vehicle for implementing redistributional and welfare objectives on a rather massive scale. It is designed primarily to benefit the poorest 20 percent of families. Yet, fully 50 percent of its revenues are financed through an additional 5 percent levy on payrolls, fully payable by employers. This brings the total of employer contributions and taxes to 17.5 percent of the payroll bill. Particularly in a situation of subsidized credit and fiscal incentives to investment in capital goods, and one in which industrial plant is already operated at only 65-70 percent of

Table 11. Costa Rica: Value of Exports, 1950-73

| Year | Total | Subtotal | Coffee | Bananas | Cocoa | Beef | Sugar | Other | Nonagricultural products |
|---|---|---|---|---|---|---|---|---|---|
| | Percentages | | | | | | | | |
| | | Agricultural products | | | | | | | |
| 1950 | 100.0 | 100.0 | 33.0 | 58.4 | 3.7 | 0.0 | 0.0 | 4.9 | 0.0 |
| 1951 | 100.0 | 99.4 | 34.7 | 55.5 | 3.1 | 0.0 | 0.0 | 6.1 | 0.6 |
| 1952 | 100.0 | 98.0 | 30.2 | 52.8 | 5.8 | 0.1 | 0.8 | 8.3 | 2.0 |
| 1953 | 100.0 | 98.1 | 41.7 | 44.8 | 5.0 | 0.4 | 0.8 | 5.4 | 1.9 |
| 1954 | 100.0 | 98.0 | 41.3 | 42.4 | 9.8 | 0.0 | 0.6 | 3.9 | 2.0 |
| 1955 | 100.0 | 97.8 | 46.0 | 40.9 | 7.0 | 0.0 | 0.7 | 3.2 | 2.2 |
| 1956 | 100.0 | 95.5 | 49.4 | 37.5 | 4.2 | 0.1 | 0.0 | 4.3 | 4.5 |
| 1957 | 100.0 | 95.2 | 47.9 | 38.0 | 4.7 | 0.2 | 0.1 | 4.3 | 4.8 |
| 1958 | 100.0 | 96.1 | 54.4 | 28.5 | 6.3 | 1.0 | 0.2 | 5.7 | 3.9 |
| 1959 | 100.0 | 95.2 | 51.7 | 24.7 | 9.5 | 3.7 | 0.8 | 4.8 | 4.8 |
| 1960 | 100.0 | 92.3 | 51.5 | 23.8 | 6.9 | 5.0 | 2.1 | 3.0 | 7.7 |
| 1961 | 100.0 | 94.4 | 52.7 | 24.5 | 5.6 | 3.3 | 3.7 | 4.6 | 5.6 |
| 1962 | 100.0 | 95.0 | 51.7 | 28.7 | 5.2 | 2.9 | 3.0 | 3.5 | 5.0 |
| 1963 | 100.0 | 93.6 | 47.8 | 27.2 | 4.5 | 5.3 | 5.4 | 3.4 | 6.4 |
| 1964 | 100.0 | 84.1 | 42.0 | 24.7 | 3.5 | 5.2 | 4.5 | 4.2 | 15.9 |
| 1965 | 100.0 | 81.0 | 41.8 | 25.3 | 2.0 | 2.9 | 4.2 | 4.8 | 19.0 |
| 1966 | 100.0 | 78.1 | 38.8 | 21.5 | 2.3 | 4.0 | 6.4 | 5.1 | 21.9 |
| 1967 | 100.0 | 78.0 | 36.3 | 21.6 | 2.2 | 6.0 | 5.9 | 4.0 | 22.0 |
| 1968 | 100.0 | 75.5 | 32.5 | 25.2 | 1.7 | 7.1 | 5.1 | 3.9 | 24.5 |
| 1969 | 100.0 | 76.4 | 29.5 | 27.2 | 3.7 | 8.0 | 4.8 | 3.2 | 23.6 |
| 1970 | 100.0 | 75.6 | 31.6 | 28.9 | 0.8 | 7.8 | 4.4 | 2.1 | 24.4 |
| 1971 | 100.0 | 72.7 | 26.4 | 28.5 | 0.7 | 9.2 | 5.8 | 2.1 | 27.3 |
| 1972 | 100.0 | 75.8 | 27.9 | 29.7 | 1.1 | 10.2 | 4.7 | 2.2 | 24.2 |
| 1973 | 100.0 | 72.7 | 27.3 | 26.3 | 1.3 | 9.2 | 6.2 | 2.4 | 27.3 |

Source: Banco Central de Costa Rica.

Table 12. Costa Rica: Value of Exports, 1950-73

| Year | Millions of current U.S. dollars | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|
| | Total | Agricultural products | | | | | | | Nonagricultural products |
| | | Subtotal | Coffee | Bananas | Cocoa | Beef | Sugar | Other | |
| 1950 | 54.0 | 53.9 | 17.8 | 31.5 | 2.0 | 0.0 | 0.0 | 2.6 | 0.1 |
| 1951 | 62.0 | 61.5 | 21.5 | 34.4 | 1.9 | 0.0 | 0.0 | 3.7 | 0.5 |
| 1952 | 72.7 | 71.5 | 22.0 | 38.4 | 4.2 | 0.1 | 0.6 | 6.2 | 1.2 |
| 1953 | 79.9 | 78.3 | 33.3 | 35.8 | 4.0 | 0.3 | 0.6 | 4.3 | 1.6 |
| 1954 | 84.5 | 82.8 | 34.9 | 35.8 | 8.3 | 0.0 | 0.5 | 3.3 | 1.7 |
| 1955 | 81.1 | 79.4 | 37.4 | 33.2 | 5.6 | 0.0 | 0.6 | 2.6 | 1.7 |
| 1956 | 68.5 | 65.4 | 33.8 | 25.7 | 2.9 | 0.1 | 0.0 | 2.9 | 3.1 |
| 1957 | 84.8 | 80.7 | 40.6 | 32.2 | 4.0 | 0.1 | 0.1 | 3.7 | 4.1 |
| 1958 | 92.9 | 89.1 | 50.5 | 26.5 | 5.8 | 0.9 | 0.1 | 5.3 | 3.8 |
| 1959 | 77.4 | 73.7 | 40.0 | 19.1 | 7.4 | 2.9 | 0.6 | 3.7 | 3.7 |
| 1960 | 85.3 | 78.8 | 43.9 | 20.3 | 5.9 | 4.3 | 1.8 | 2.6 | 6.5 |
| 1961 | 85.2 | 80.3 | 44.9 | 20.8 | 4.8 | 2.8 | 3.1 | 3.9 | 4.9 |
| 1962 | 93.8 | 89.0 | 48.4 | 26.9 | 4.9 | 2.7 | 2.8 | 3.3 | 4.8 |
| 1963 | 94.9 | 88.8 | 45.3 | 25.8 | 4.3 | 5.0 | 5.1 | 3.3 | 6.1 |
| 1964 | 114.4 | 96.3 | 48.0 | 28.3 | 4.1 | 6.0 | 5.1 | 4.8 | 18.1 |
| 1965 | 111.7 | 90.4 | 46.6 | 28.3 | 2.2 | 3.2 | 4.7 | 5.4 | 21.3 |
| 1966 | 135.7 | 106.0 | 52.6 | 29.2 | 3.1 | 5.5 | 8.7 | 6.9 | 29.7 |
| 1967 | 143.3 | 111.5 | 54.8 | 30.9 | 3.1 | 8.6 | 8.4 | 5.7 | 31.8 |
| 1968 | 170.0 | 128.5 | 55.3 | 42.8 | 3.0 | 12.0 | 8.7 | 6.7 | 41.5 |
| 1969 | 189.6 | 144.6 | 55.8 | 51.5 | 7.1 | 15.1 | 9.1 | 6.0 | 45.0 |
| 1970 | 231.0 | 174.8 | 73.1 | 66.8 | 1.9 | 18.0 | 10.1 | 4.9 | 56.2 |
| 1971 | 224.6 | 162.8 | 59.3 | 64.0 | 1.5 | 20.5 | 12.9 | 4.6 | 61.8 |
| 1972 | 273.9 | 211.2 | 77.9 | 82.8 | 3.0 | 28.3 | 13.1 | 6.1 | 62.7 |
| 1973 | 344.3 | 250.3 | 94.0 | 90.7 | 4.4 | 31.5 | 21.5 | 8.2 | 94.0 |

Source: Banco Central de Costa Rica.

Table 13. Percent Distribution by Number of Firms and Value of National and Foreign Investment in Costa Rica, Cumulative, 1960-75

| Industry group | National | | Foreign | |
|---|---|---|---|---|
| | Number | Value | Number | Value |
| Shoes, clothing, leather | 91 | 68 | 9 | 32 |
| Foods and beverages | 71 | 39 | 29 | 61 |
| Construction materials | 76 | 56 | 24 | 44 |
| Containers and packaging | 81 | 35 | 19 | 65 |
| Cosmetics | 90 | 91 | 10 | 9 |
| Pharmaceuticals | 76 | 40 | 24 | 60 |
| Agricultural implements | 92 | 88 | 8 | 12 |
| Office equipment and paper products | 74 | 27 | 26 | 73 |
| Fertilizers and related products | 74 | 6 | 26 | 94 |
| Radios and electronic equipment | 48 | 8 | 52 | 92 |
| Furniture and accessories | 73 | 29 | 27 | 71 |
| Other | 73 | 68 | 27 | 32 |

Source: Jose Luis Vega Carballo,"Costa Rica; Coyunturas Economicas, Clases Sociales y Estado en su Desarollo Reciente, 1930-1975," Academia Costarricense de Bibliografia, 1977.

capacity, this would seem to add a potentially damaging degree of incentive to further substitution of capital for labor. The restriction of potential employment implicit in this form of finance is highly anomalous for a program whose aims are welfare and redistribution.

Yet a shift of these proportions to finance from general revenues would undoubtedly entail a major restructuring of the existing fiscal system, which, being predominantly based on indirect taxation, is already the object of scrutiny with regard to its distributional effects. Any dramatic changes in the progressivity of the income tax, or in the taxation of assets, might well bring about considerable short-term instability in output and investment, with potentially serious consequences for employment and distribution. Quality and timing of execution, as well as a shift in focus, would seem to be essential to making rapid progress in achieving equitable growth. A means for reconciling inevitable tradeoffs and inconsistencies, highly effective and detailed planning, and the framework within which to conduct such planning, is of the greatest importance.

Another trend which must be reversed through interventions aimed at altering the structure and output-composition of future industrial development is that illustrated by Table 14 below. A significant opportunity for increasing domestic employment is being missed by fostering an industrial development which apparently is so inadequately linked to other sectors of the domestic economy.

Table 14. Costa Rica: Imported Raw Materials and Intermediate Goods (RMIG) as a Percent of Total RMIG Used in Industrial Production, by Value

| Year | RMIG by value |
|---|---|
| 1963 | 26.9 |
| 1967 | 31.7 |
| 1968 | 33.0 |
| 1969 | 32.2 |
| 1970 | 37.9 |
| 1971 | 37.0 |
| 1972 | 31.2 |
| 1975 | 39.9 |

Source: 1963-1972, Compendio Estadístico Centroamericano, SIECA, 1975; IV Censo de Manufactura 1975, Direccion General de Estadística y Censos, April 1978.

Dependency

While a large number of policy instruments seem to be available to government for dealing with rural-urban imbalance and inadequate employment, the dependency burden among the poor is, at least in the short run, less amenable to public sector intervention except through direct consumption transfers. Voluntary family planning programs have been least effective among those who need them most -- the rural, under-educated poor. They are slow to have an impact on poverty, and do not address the other aspect of dependency, which is indigent old age.

The Asignaciones Familiares Program, through its feeding, rural health, and non-contributory pensions, is such a consumption-transfer program. Potentially, far more could be accomplished with its resources, however, were it to stress direct income transfers patterned after the Figueres plan to a greater extent than at present. Such transfers are being conducted on a small-scale experimental basis which deserves careful study and consideration in developing a national program.

It has been argued that such a program would foster irresponsible parenthood and/or irresponsible consumption of public funds destined for children. It can also be argued, however, that the ultimate determinants of family size are such factors as education, social mores, urbanization, and female participation in the labor force, and that irresponsible consumption is best dealt with through education, moral suasion and the judicial system. Certainly, the reduction in administrative costs and the targetting efficiency of an income transfer program argue strongly in favor of its consideration as an alternative or supplement to the current nutrition program.

Education

A recent ECLA-IBRD study entitled "Decomposition Analysis of the Inequality of Earnings in Latin American Countries" (Altimir and Pinera, 1977) reports that close to 50 percent of the inequality of earnings in

the San José Metro Area, as measured by the Theil index, can be accounted for by variations in the related variables -- education and category of occupation. About 60 percent is accounted for by differences in education, occupation, and age taken together. We have already seen how educational attainment correlates with income and employment and is a significant differentiator among the urban poor and non-poor.

Public financing of education has been, should, and will continue to be a principal form of investment transfer carried out by the Costa Rican government. Priority should be given to rural education in spite of the current lower correlation of education with income and employment in the rural areas, for three reasons. One, the problem is greater in the rural areas. Two, as rural development progresses, education will become a more important determinant of income and employment in those areas than at present. Three, through rural-urban migration, rural education impacts on income, and employment - and on poverty - in the urban areas.

Conclusion

As evidenced by the preceding analysis, past public sector performance reflects a history of commitment to meeting basic human needs. Costa Rica's comprehensive health care system compares favorably not only with current Latin American standards but meets established international standards as well.

Public opinion, as indicated by survey results strongly supports reformist and redistributional public sector activity. The public seems to be keenly aware of the shortcomings that exist in public sector performance. Costa Rica's open and participatory political system enables the public to exert considerable pressures on the government to improve its performance. Public pressures and the political weight and influence of numbers provide necessary political inputs and feedback, which, when compared to other Latin American countries, may well assure social stability and maintenance of Costa Rica's political system.

There is ample evidence that the government is aware of the importance of linkages between income distribution, quality of growth and the means available within the public sector to sustain its commitment to meeting basic needs and to equitable growth. Many of the issues and alternatives raised in section IV are by no means original observations. They do in fact, reflect major portions of a development strategy already in effect and in the implementation phase.

The 1978-82 Development Plan, prepared by OFIPLAN under the auspices of the Liberación National government and the 1978-82 Program of Costa Rica's opposition Unidad party (now in power) concurred on the priorities, conceptual approaches and the necessary imaginativeness for effective developmental planning. Both documents seem to reflect a general political consensus, and strong support for equitable growth. The two documents

are explicit in their recognition of the specific problems of the poor in ranking equity as an overall priority in development planning and public sector intervention. Both place stress on human resource investments, accessible to all strata of society on an equal basis, backed up by concrete proposals. It is recognized that the rural sector requires priority attention with respect to health, education, infrastructure, institutional development, strengthening local government, and employment creation through vigorous expansion of agricultural and agroindustrial production. Export incentives and promotion are acknowledged to be the key elements for success in these areas. Both documents are highly critical of the efficiency and fiscal incidence of public sector activity. Small- and intermediate-scale production will receive priority attention in both rural and urban areas. Both documents also stress the need to renegotiate Common External Tariff Agreements with CACM in order to remove now inappropriate levels of protection to import-substituting industries.

The substance of the Costa Rican experience in the last two decades may be summarized as follows:

1. Achievement of rapid and sustained growth while avoiding the negative distributional impacts which often accompany such growth.

2. Heavy and sustained emphasis on human resource development.

3. Institutional development within an open, stable and democratic political environment.

We have examined the important role played by a set of unusually favorable "initial conditions" in facilitating these achievements over this recent period.

Through these achievements, Costa Rica has now created a new set of "initial conditions". These will permit the equity aspects of development there to shift from an era characterized by avoidance of the negative, primarily through conventional consumption transfers, to one in which strong positive inroads towards the elimination of absolute poverty and the rapid reduction of economic inequities may be confidently expected.

## Footnotes

### Chapter I

1. Hollis Chenery et al., Redistribution with Growth, London, Oxford University Press, 1974, p. xv; the other countries mentioned are Israel, Yugoslavia, Taiwan, South Korea, Sri Lanka, and Tanzania.

2. The original discussion of the "basic needs" concept as it has been used in the recent development literature is in Chapter 2 of International Labour Office, Employment, Growth and Basic Needs: A One-World Problem, Geneva, ILO, 1976.

3. This data is cited in James P. Grant, "Disparity Reduction Rates in Social Indicators," Washington, D.C., Overseas Development Council, September 1978; the estimates are from Oscar Alttinis, The Extent of Poverty in Latin America, Santiago, ECLA, 1978.

4. For the definitions of the PQLI and DRR, see James P. Grant, "Disparity Reduction Rates in Social Indicators," Washington, D.C., Overseas Development Council, September 1978.

5. Overseas Development Council, The United States and World Development: Agenda 1979, New York, Praeger Publishers, 1979, Annex A.

6. This comparison holds if extended to include all of Latin America; the only other Latin American countries which have achieved a PQLI in the '80s are Guyana, whose per capita GNP is about $600; Jamaica and Trinidad/Tobago; see Ibid., Table A-4.

7. Costa Rica's DRR is exceeded in Latin America only by the DRR's for Jamaica (4.8%) and Trinidad/Tobago (4.0%); Grant, op. cit. Annex B.

8. World Bank, World Development Report, 1978, Washington, D.C. The World Bank, August 1978, Annex Table 1; "middle-income" in this case refers to countries with a per capita GNP above $250 in 1976.

9. The other examples of rapid per capita GNP growth in Latin America are Ecuador (3.6% per annum, 1960-1976) and the Dominican Republic (3.4% per annum, 1960-76), ibid.

10. For figures on structural change, export growth and inflation, and comparisons with other LDCs, see World Development Report, 1978, Annex Tables 1-7.

11. The Gini coefficient is a numerical indicator of the degree to which a Lorenz curve (which plots proportions of income against proportions of population, by deciles or key other intervals) bows out from the 45 line indicating perfect equality of income distribution. The Gini coefficient may range from zero (perfect equality) to 1 (all income accrued to 1 person), but most observed values fall between 0.25 (e.g., Poland) and about 0.60 (e.g., Brazil), although Bulgaria is reported as having a Gini coefficient of 0.21, and Ecuador's Gini coefficient is reported as 0.66. For a good discussion of measures of inequality and a classification of countries by income levels and levels of inequality, see Michael P. Todaro, Economic Development in the Third World, New York, Longmans, 1977, Chapter 5 ("Growth, Poverty and Income Distribution").

12. Albert Fishlow, "Brazilian Size Distribution of Income," American Economic Review, May 1972.

13. George Guess, "Narrowing the Case of Costa Rican Democracy," Development Change, October 1978.

14. The importance of the distinction between initial conditions and subsequent policies is emphasized in Gustav Ranis, "Equity with Growth in Taiwan: How 'Special' is the 'Special Case'?", World Development, 1978, and T. N. Srinivasan, "Development, Poverty and Basic Human Needs: Some Issues," Food Research Institute Studies, Vol. XVI, No. 2, (1977).

15. This categorization draws upon Chenery et al., op. cit., and ILO, op. cit. For a detailed discussion of various "policy areas," see Chenery et al., Chapter 4 (by Montek S. Ahluwalia) and IW, Chapter 3.

16. For a very readable brief summary of some of the alternative prescriptions for equitable growth, see James Weaver and Kenneth Jameson, "Economic Development, Competing Paradigms - Competing Parables," Occasional Paper No. 3, Development Studies Program, AID.

17. For an excellent discussion of the effect of import substitution policies on growth, employment, and income distribution, see Derek T. Healey.

    The importance of land reform, local institutional development, appropriate technologies, and pricing policy is stressed (with varying degrees of emphasis on different "policy areas") in Gustav Ranis, op. cit.; Irma Adelman, "Growth, Income Distribution, and Equity - Oriented Development Strategies," World Development, February-March 1975; and Edgar Owens and Robert Shaw, Development Reconsidered, Cambridge, Mass., Lexington Books, 1972, (especially Chapter 2).

Chapter II.

1. Thiel, Bernardo, "Monografía de la Poblacion de la República de Costa Rica durante el Siglo XIX," San Jose, 1902.

2. Saenz, Carlos Joaquin, Population Growth, Economic Progress and Opportunities on the Land, University of Wisconsin, 1972, p. 13.

3. Ibid.

4. Hall, Carolyn, El Café y el Desarollo Histórico - Geográfico de Costa Rica, Editorial Costa Rica, San Jose, 1976.

5. Stove, Samuel, La Dinastía de los Conquistadores, EDUCA, San Jose, 1975, pp. 216-218.

6. Seligson, Mitchell, "Agrarian Policies in Costa Rica," paper presented at the September 1975 meeting of the American Political Science Association, pp. 14-15.

7. Cerdas, Rodaofo, La Crisis de la Democracia Liberal en Costa Rica, EDUCA, San José, 1972, pp. 71-85.

8. Bell, John Patrick, Guerra Civil en Costa Rica, EDUCA, San José, 1976, pp. 43-48.

Chapter III.

1. See SIECA - VI Compendio Estadístico Centroamericano, 1975.

2. Ibid.

3. Davis et al., Rural Electrification: An Evaluation of Effects on Economic and Social Changes in Costa Rica and Colombia, University of Florida, August 1973.

4. Cavajal, M. J. and W. R. Goodwin, "Mexicados de Vivienda y Tierras," in Carvajal ed., Politicas de Crecimiento Urbano, University of Florida, 1977, pp. 145-165.

5. Gomez, F. et al., "Mortality in Second and Third Degree Malnutrition", Journal of Tropical Pediatrics, 1956.

6. USAID/Costa Rica, Costa Rica: Nutrition Assessment, San Jose, 1975.

Chapter IV.

1. Oficiera de Información, Segunda Encuesta Periodica de Opinion Publica, Ministeris de la Presidencia, San Jose, 1977.

2. USAID, Urban Environment Project Paper: Costa Rica, July 1978.

3. Adelman, Irma, and Sherman Robinson, Income Distribution Policy in Developing Countries: The Case of Korea, Stanford University Press, 1978.

4. Rapaport, A., "Estructura Industrial en Centroamerica", in Beneficios y Costos de la Integracion Económica Centroamericana, SIECA/ Brookings, Volume 2, 1977.

# ANNEX A

## Costa Rica: Basic Economic and Social Indicators

| Item | 1960 | 1970 | 1974 | 1975 | 1976 | 1960-70 | 1970-75 | 1970-76 |
|---|---|---|---|---|---|---|---|---|
| Area, in thousands of square kilometers: 51 | | | | | | | | |
| Population (millions) | | | | | 2.0 | | | |
| GNP per capita: | | | | | | | | |
| Figured in U.S. dollars | | | | | 1,040 | | | |
| Average annual growth rate (percent) | | | | | | | | 3.4 |
| Index of food production per capita (Index: 1965-7 = 100) | | | | 130 | | | | |
| Average annual inflation rate | | | | | | 1.9 | | 13.7 |
| Average annual growth rate (percent): | | | | | | | | |
| GDP | | | | | | 6.5 | | 6.5 |
| Agriculture | | | | | | 5.7 | | 3.8 |
| Industry | | | | | | 9.3 | | 8.0 |
| Services | | | | | | 6.0 | | 7.1 |
| Distribution of GDP (percent): | | | | | | | | |
| Agriculture | 29 | | | | 21 | | | |
| Industry | 19 | | | | 53 | | | |
| Services | 52 | | | | 53 | | | |
| Distribution of GDP (percent): | | | | | | | | |
| Public consumption | 10 | | | | 17 | | | |
| Private consumption | 76 | | | | 70 | | | |
| Gross domestic savings | 14 | | | | 13 | | | |
| Gross domestic investment | 18 | | | | 22 | | | |
| Resource balance | -4 | | | | -9 | | | |

| Item | 1960 | 1970 | 1974 | 1975 | 1976 | 1960-70 | 1970-75 | 1970-76 |
|---|---|---|---|---|---|---|---|---|
| Merchandise trade percentage share: | | | | | | | | |
| Exports: | | | | | | | | |
| Primary commodities | 95 | | | 74 | | | | |
| Manufactures | 5 | | | 26 | | | | |
| Imports: | | | | | | | | |
| Food | 13 | | | 10 | | | | |
| Fuel | 6 | | | 11 | | | | |
| Other | 81 | | | 79 | | | | |
| Factors related to population and labor force: | | | | | | | | |
| Population growth and distribution | | | | | | | | |
| Average annual growth rate (percent): | | | | | | | | |
| Total population | | | | | | 3.5 | 2.5 | |
| Urban population | | | | | | 4.6 | 3.8 | |
| Labor force | | | | | | 3.5 | 3.8 | |
| Percent of population in agriculture | 51 | 42 | | | | | | |
| Percent of population in urban areas | 34 | | | 40 | | | | |
| Age: | | | | | | | | |
| Less than 15 | 48 | | | 42 | | | | |
| Working age, 15-64 | 49 | | | 55 | | | | |

Continued --

ANNEX A (contd)

## Costa Rica: Basic Economic and Social Indicators

| Item | 1960 | 1970 | 1974 | 1975 | 1976 | 1960-70 | 1970-75 | 1970-76 |
|---|---|---|---|---|---|---|---|---|
| Demographic factors: | | | | | | | | |
| Crude birth rate per thousand | 47 | | | 29 | | | | |
| Crude death rate per thousand | 10 | | | 6 | | | | |
| Percentage change: | | | | | | | | |
| Birth rate | | | | | | | -38.3 | |
| Death rate | | | | | | | -40.0 | |
| Fertility rate | | | | 4.6 | | | | |
| Health factors: | | | | | | | | |
| Life expectancy at birth | 61 | | | 68 | | | | |
| Mortality rate per thousand: | | | | | | | | |
| Infants, 0-1 | 71 | | | 38 | | | | |
| Children, 1-4 | 7 | | | 3 | | | | |
| Population per health professional: | | | | | | | | |
| Physician | 2,600 | | 1,580 | | | | | |
| Nurse | 1,700 | | 640 | | | | | |
| Population having safe water (percent) | | | | 72 | | | | |
| Educational factors: | | | | | | | | |
| Adult literacy rate (percent) | 84 | | 89 | | | | | |
| Primary school enrolees as percent of age group: | | | | | | | | |
| Total | 96 | | | 109 | | | | |
| Female | 95 | | | 109 | | | | |
| Secondary school enrolees as percent of age group | 21 | | | 52 | | | | |
| Higher education enrolees as percent of population, 20-34 | 5 | | | 17 | | | | |

Source: Data extracted from IBRD World Development Report, 1978.

# ANNEX B

## I. Income Distribution in Costa Rica

Estimates of the distribution of total family income at the national level exist for only two years -- 1961 an 1971 (see Table below). Comparison of the two distributions indicates a rather drastic redistribution of family income away from the richest 10 percent of families in favor of deciles 4 through 9. This redistribution is accompanied by a fall in the Gini coefficient from .52 in 1961 to .44 in 1971. Although the figures do not indicate improvement in the relative positions of the poorest 20 percent of families, the overall redistributive performance is a remarkable achievement for a country experiencing rapid growth.

Table 1. Costa Rica: Size Distribution of Family Income

| Decile | 1961 [a] | 1971 [b] |
|---|---|---|
| 1 | 2.6 | 2.1 |
| 2 | 3.4 | 3.3 |
| 3 | 3.8 | 4.2 |
| 4 | 4.0 | 5.1 |
| Subtotal | 13.8 | 14.7 |
| 5 | 4.4 | 6.2 |
| 6 | 5.4 | 7.5 |
| 7 | 7.1 | 9.3 |
| 8 | 9.3 | 11.7 |
| 9 | 14.0 | 16.2 |
| 10 | 46.0 | 34.4 |
| Gini Coefficient | | |

a. ECLA
b. Cespedes, 1973.

The reliability of the 1961 figures, however, must be seriously questioned when considering the following conditions and indicators of the Costa Rican economy:

1. The relative stability of San José Metropolitan Area family income distribution across the years 1958, 1961, 1971 and 1974;

2. The stability of the national distribution of income from wages and salaries between Population Census years 1963 and 1973;

3. The deterioration in the distribution of land between Agricultural Census years 1963 and 1973;

4. Indications from the respective Agricultural Censuses of a concentration of agricultural production, assumed to be the principal source of non-wage, non-salary income outside of the San José Metropolitan Area;

5. Indications of a concentration of industrial production between Census of Manufactures years 1964 and 1975;

6. The lack of documentation and of known primary data sources which would support the Economic Council for Latin America's ECLA) 1961 national findings.

## 1. The Distribution of Family Income Within the San José Metropolitan Area

Table 2 presents the available data on the distribution of family income within the San José Metropolitan Area.

Table 2. Costa Rica: San José Metropolitan Area Size Distribution of Family Income

| Decile | 1958[a] | 1961[b] | 1971[c] | 1974[d] |
|---|---|---|---|---|
| 1 | 1.9 | 2.2 | 2.1 | 1.5 |
| 2 | 3.2 | 2.9 | 3.2 | 2.9 |
| 3 | 4.1 | 4.1 | 4.2 | 3.9 |
| 4 | 4.9 | 4.8 | 5.2 | 4.9 |
| 5 | 6.0 | 5.6 | 6.4 | 6.0 |
| 6 | 7.3 | 7.0 | 7.6 | 7.4 |
| 7 | 9.1 | 8.7 | 9.4 | 9.2 |
| 8 | 11.8 | 11.3 | 11.6 | 11.9 |
| 9 | 16.6 | 15.7 | 15.8 | 16.7 |
| 10 | 34.9 | 37.7 | 34.7 | 35.7 |
| GINI coefficient | .46 | .48 | .44 | .47 |

a. andés. Cespedes, 1973. b. Quintana, 1962. d. Cespedes and Tristan, 1977.

It should be noted that there may be differences in survey procedures between 1961 and the remaining years. The latter were household surveys conducted by the Dirección General de Estadística y Censos, while the 1961 figures ares based on household survey conducted by Mr. Carlos Quintana of the University of Costa Rica.

Irrespective of the minor differences of comparison between these two surveys, an evaluation of the data permits the following observation. First, no major redistribution of family income away from the top decile took place in the San José Area between 1958 and 1974. Second, the distributions are remarkably stable throughout their range over the period of observation. Third, gradual improvement in the distributions between 1958 and 1971, to the extent it is statistically significant, seems to have eroded between 1971 and 1974. This last result is consistent with the expected differential impact of accelerating inflation on wage and salary as opposed to property income. In sum, it would appear that the size distribution of family income within the San José Metropolitan Area has remained quite stable between 1958 and 1974, at a Gini coefficient of of approximately .46.

Table 3 disaggregates family income distribution figures for 1971 into National, Metropolitan Area, other Urban and Rural distributions. Average monthly income levels in current colones are also presented.

Table 3 shows a rather typical pattern of distributions across the various regional categories. National income is disproportionately con-

Table 3. Costa Rica: Distribution of Family Income per Month, 1971

| Decile | Percent of family income | | | | Average family income[a] | | | |
|---|---|---|---|---|---|---|---|---|
| | Costa Rica | Metro. area | Other urban[b] | Rural | Costa Rica | Metro. area | Other urban[b] | Rural |
| 1 | 2.1 | 2.1 | 2.3 | 2.8 | 248 | 387 | 335 | 218 |
| 2 | 3.3 | 3.2 | 3.9 | 4.1 | 384 | 589 | 570 | 329 |
| 3 | 4.2 | 4.2 | 4.8 | 5.1 | 490 | 763 | 706 | 404 |
| 4 | 5.1 | 5.2 | 5.7 | 6.1 | 603 | 962 | 826 | 483 |
| 5 | 6.2 | 6.4 | 6.6 | 7.2 | 730 | 1166 | 981 | 569 |
| 6 | 7.5 | 7.6 | 8.2 | 8.4 | 883 | 1411 | 1191 | 675 |
| 7 | 9.3 | 9.4 | 9.6 | 10.1 | 1085 | 1739 | 1428 | 800 |
| 8 | 11.7 | 11.6 | 12.5 | 12.3 | 1378 | 2117 | 1813 | 981 |
| 9 | 16.2 | 15.8 | 17.2 | 15.8 | 1895 | 2924 | 2543 | 1255 |
| 10 | 34.4 | 34.7 | 29.1 | 28.2 | 4104 | 6445 | 4299 | 2255 |
| TOTAL | 100.0 | 100.0 | 100.0 | 100.0 | 1175 | 1846 | 146[illegible] | 796 |
| GINI coefficient | .44 | .44 | .39 | .37 | | | | |

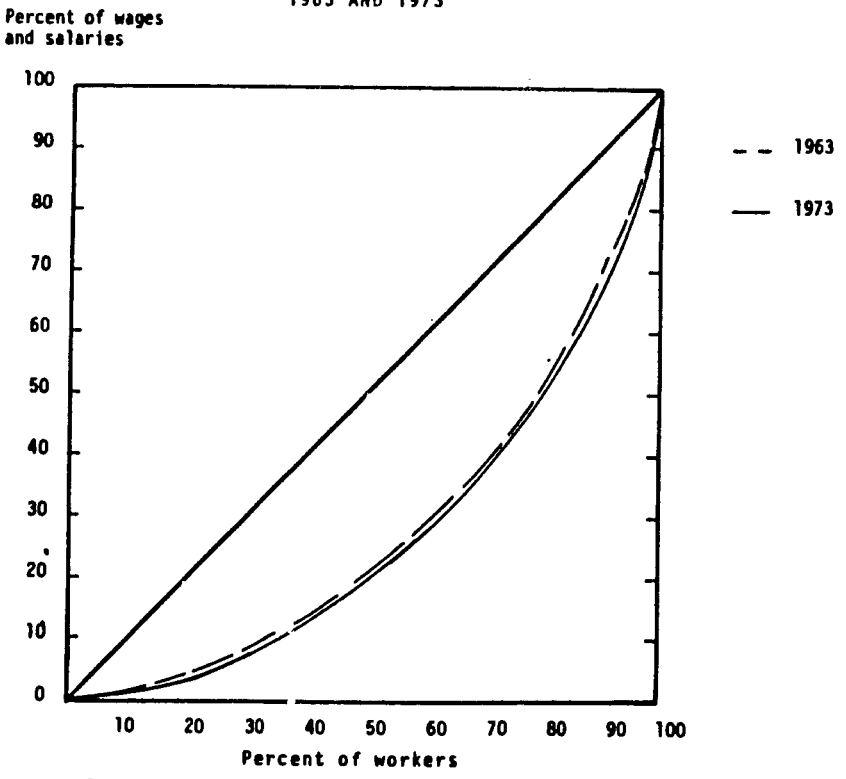
a. Colones per month.
b. Excludes the San José Metropolitan Area.
Source: Céspedes, 1973.

centrated within the capital than in either the other Urban or Rural areas. This pattern is likely to have held over time. Given the likelihood of some concentration of rural income during the nineteen sixties (to be documented below), the stability of the San Jose distribution as depicted in Table 6 could not have taken place. In all probability, the degree of concentration in the distribution of income within the San Jose Metropolitan Area, as measured by the Gini coefficient, serves as an upper bound for the degree of concentration of national income. We may therefore infer a tentative conclusion to the effect that the Gini coefficient associated with the national distribution of income in Costa Rica did not exceed .46 in 1958 and has probably displayed stability similar to that of the San Jose distribution. The significance of this inference lies in that .46 is a low number even by current Latin American standards, and is a remarkably low number for 1958. If our inference is accurate, it indicates that Costa Rica achieved a relatively equitable distribution early on, a result that is consistent with the historical development of Costa Rica's economy.

## 2. The Distribution of Income from Wages and Salaries

Figure 1 presents Lorenz curves depicting the distribution of wage and salary income for Costa Rica for Census years 1963 and 1973, prepared by Lic. Manuel Baldares IDESPO, of the Universidad Nacional, Heredia, Costa Rica. The Lorenz curves and the associated Gini coefficients indicate that little change took place in the respective distribution. What change has taken place points to a very slight concentration, rather than redistribution, of income from wages and salaries. Note that Figure 1 represents Population Census data including both urban and rural wage and salary earners.

FIGURE 1. COSTA RICA: LORENZ CURVES FOR THE DISTRIBUTION OF WAGE AND SALARY INCOME AMONG WAGE AND SALARIED WORKERS, 1963 AND 1973




Source: M. Baldares, Distribucion de los Sueldas en Costa Rica, IDESPO, Universidad Nacional, July 1976. Based on Population Census data, 1963, 1973.

The observed stability in the distribution of wage and salary incomes, however, might be explained by the achievement of relative parity between agricultural and unskilled urban wages by 1973. (See Table below). This relative income parity took place in spite of the massive shift in the sectoral composition of employment, including the disproportionate absorption of displaced agricultural labor into the services, commerce, transport and unskilled trade sectors, between 1963 and 1973.

Table 4 Costa Rica: Minimum Wages in Selected Trades, 1960-74

(Colones per day)

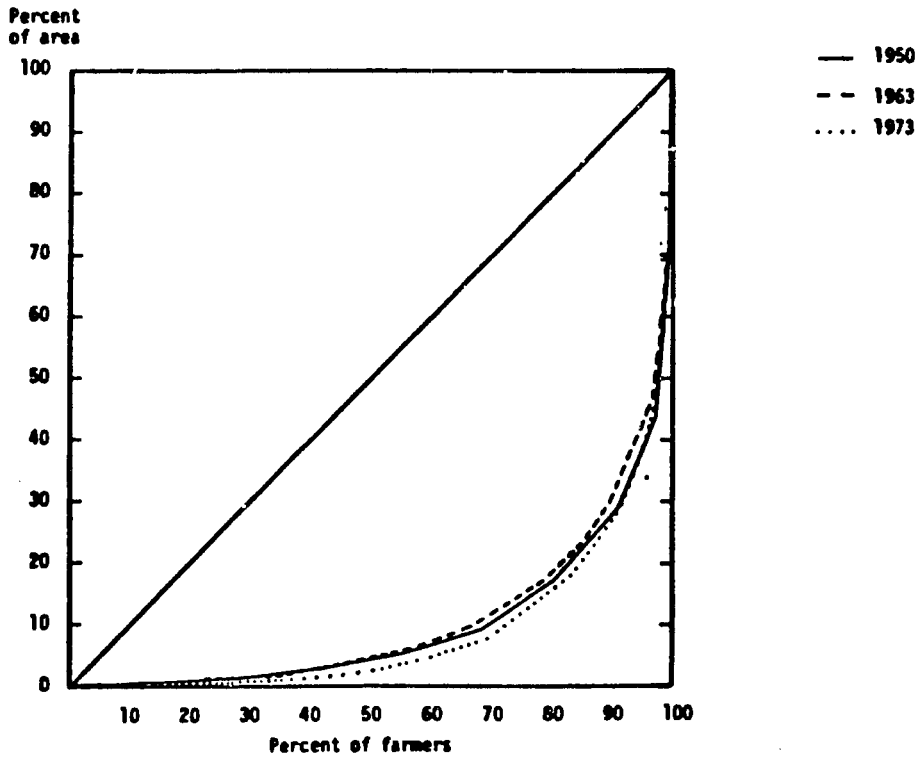
| Type of industry | Type of worker | 1960-2 | 1962-4 | 1964-6 | 1966-8 | 1968-70 | 1970-2 | 1972-4 | 1978 |
|---|---|---|---|---|---|---|---|---|---|
| Agriculture: | | | | | | | | | |
| Coffee | unskilled | 8.50 | 9.00 | 9.00 | 10.20 | 10.70 | 12.00 | 12.90 | 32.00 |
| Bananas | unskilled | 13.50 | 14.00 | 16.00 | 16.00 | 16.80 | 18.50 | 20.80 | 40.25 |
| Industry: | | | | | | | | | |
| Sugar mills | unskilled | 7.25 | 8.80 | 10.20 | 10.20 | 10.70 | 12.00 | 13.60 | 32.00 |
| Soft beverages | skilled | 13.60 | 14.40 | 16.00 | 16.00 | 17.60 | 20.20 | 23.00 | 43.70 |
| Cigarettes | unskilled | 9.80 | 10.00 | 12.00 | 12.00 | 14.00 | 18.40 | 21.00 | 37.75 |
| Textiles | weavers | 8.40 | 9.20 | 12.80 | 12.80 | 13.40 | 15.00 | 17.25 | 37.15 |
| Shirts | seamstresses | 10.80 | 12.40 | 13.20 | 13.20 | 14.30 | 16.10 | 18.05 | |
| Furniture | skilled | 18.00 | 20.00 | 22.00 | 22.00 | 22.00 | 24.75 | 27.20 | 40.60 |
| Newspapers | linotype operators | 22.00 | 22.00 | 24.20 | 24.20 | 24.20 | 38.50 | 41.20 | 64.35 |
| Leather | unskilled | 12.00 | 13.20 | 14.80 | 14.80 | 16.30 | 18.60 | 20.85 | 41.85 |
| Soap | unskilled | 8.00 | 9.20 | 10.80 | 10.80 | 11.90 | 13.60 | 15.25 | 23.50 |
| Car repairs | skilled | 18.80 | 20.00 | 22.00 | 22.00 | 23.10 | 23.50 | 23.85 | 48.65 |
| Construction: | skilled | 18.00 | 20.00 | 22.00 | 22.00 | 24.00 | 26.40 | 28.50 | 48.65 |
| | unskilled | 10.80 | 11.60 | 12.80 | 12.80 | 14.00 | 15.75 | 17.85 | 37.80 |
| Commerce: | storage and deliverymen | 11.00 | 12.00 | 12.00 | 12.00 | 13.20 | 14.20 | 15.90 | 38.00 |
| Services: | | | | | | | | | |
| Cinemas | film operators | 16.00 | 17.60 | 19.40 | 19.40 | 20.35 | 22.60 | 25.30 | 46.15 |
| Radio stations | announcers | 26.40 | 28.00 | 30.80 | 30.80 | 32.30 | 38.15 | 48.00 | 72.80 |
| Laundry and dry-cleaning | workers | 8.00 | 8.80 | 11.20 | 12.40 | 13.00 | 14.80 | 17.00 | 37.60 |

Source: National Office for Wages.

## 3. The Distribution of Land in Costa Rica

The deterioration in the distribution of land between 1963 and 1973 constitutes another factor that undermines the assumption of equity improvement in Costa Rican society. Although distribution of agricultural land among Costa Rican farmers improved slightly between 1950 and 1963 as a result of the divestiture by the banana companies of sizable tracts of unused lands, this relative gain was lost due to the increasing concentration of land tenure in subsequent years (See Figure 2 below).

FIGURE 2. COSTA RICA: DISTRIBUTION OF FARMLAND AMONG FARMERS




Source: Agricultural Census data, 1950, 1963, 1973; ITCO, 1977.

A rapid expansion of beef production for export, a resurgence of banana production, and the development of large rice and sorghum production led to a significant concentration of land tenure in the late sixties, resulting in an increase of the Gini coefficient for land distribution from .78 to 82. It should be noted, however, that there has been some decrease in the value of the Gini coefficient between 1973 and 1977 as a result of increased activity of the Costa Rican land reform institute (ITCO) (see Table below).

In spite of the activities of the ITCO, land tenure remains highly concentrated in Costa Rica. On a comparative basis, farmland distribution is more unequal in Costa Rica than in Jamaica, Honduras and Panama, while it is less unequally distributed than in Venuzuela, Argentina, Colombia, Guatemala, Uruguay or Spain.

Table 5. Costa Rica: Distribution of Farmland Among Farmers 1950, 1963 and 1973

| Year | Number of farms | Areas in hectares | Gini Coefficient |
|---|---|---|---|
| 1950 | 43,086 | 1,812,739 | .8070 |
| 1963 | 64,621 | 2,668,073 | .7866 |
| 1973 | 76,998 | 3,122,456 | .8223 |
| 1977[a] | | | .8126 |

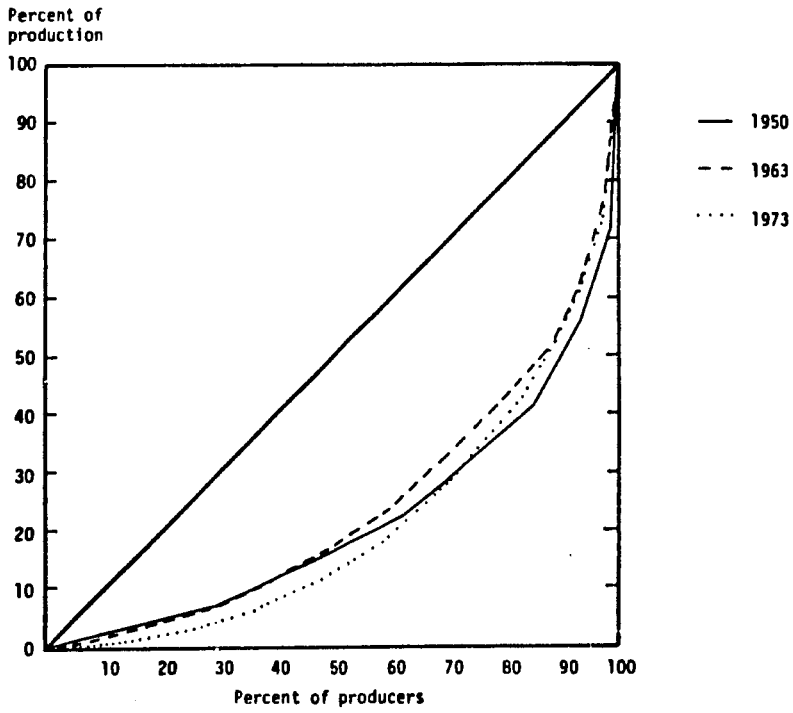
a. Based on ITCO estimates.
Source: Agricultural Census data, 1950, 1963, 1973; ITCO, 1977.

## 4. Distribution of Agricultural Production among Producers

In the absence of income data, the distribution of landholdings can be used as an important indicator of the distribution of incomes from agriculture. However, since it is generally assumed that small farmers work a larger proportion of their land and engage in higher cropping intensity per unit of area than do larger farmers, the non-wage, non-salary incomes from agricultural production may not directly correspond to that of land tenure. Consequently the land distribution data must be supplemented by data on the distribution of production among producers.

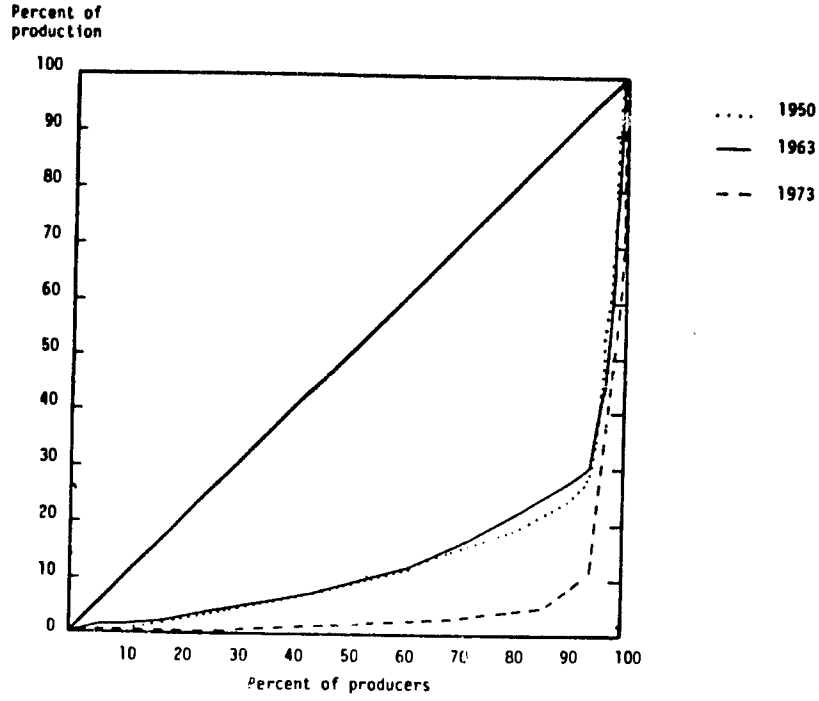
A series of Lorenz curves were developed on the basis of Agricultural Census data from 1950, 1963, and 1973 for each of the major crops produced in Costa Rica, as well as of livestock. Appendix Figures 3-9 present this information for coffee, bananas, rice, cattle, sugar cane, corn, and beans, respectively.

FIGURE 3. COSTA RICA: DISTRIBUTION OF COFFEE PRODUCTION AMONG COFFEE PRODUCERS



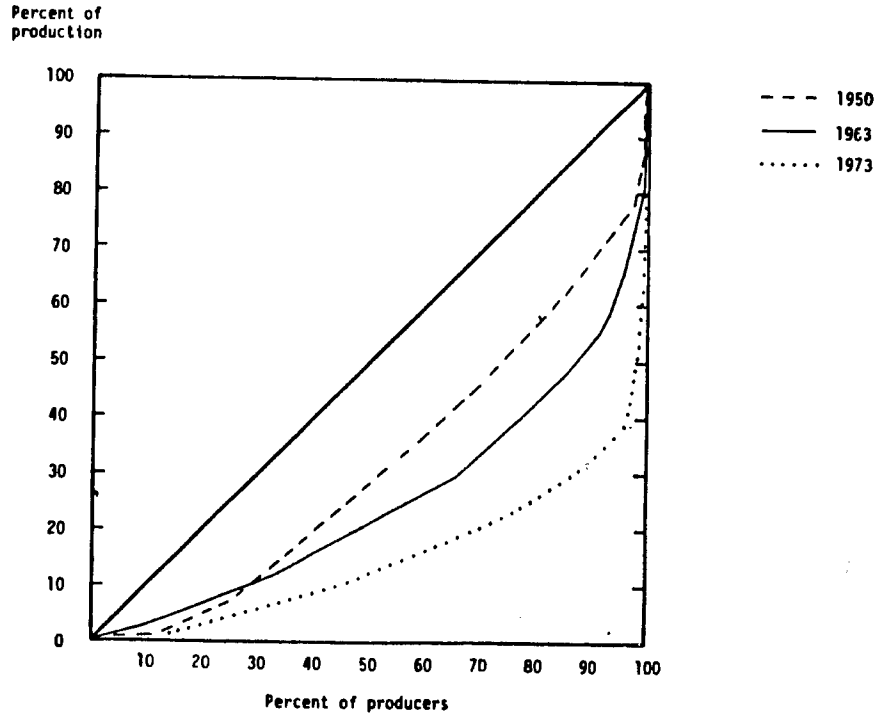

Source: Agricultural Census data: 1950, 1963, 1973.

FIGURE 4. COSTA RICA: DISTRIBUTION OF BANANA PRODUCTION AMONG BANANA PRODUCERS




Source: Agricultural Census data: 1950, 1963, 1973.

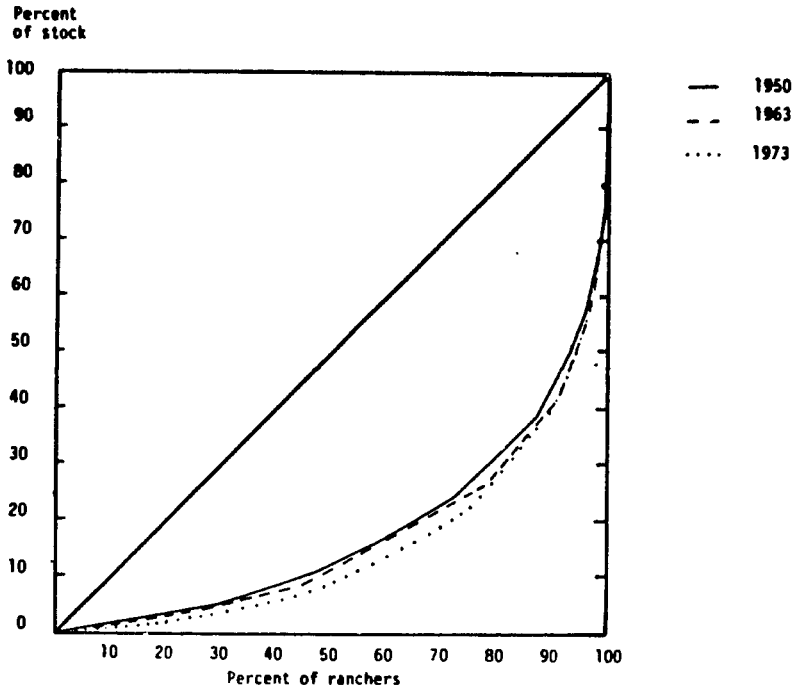
FIGURE 5. COSTA RICA: DISTRIBUTION OF RICE PRODUCTION AMONG RICE PRODUCERS




Source: Agricultural Census data: 1950, 1963, 1973.

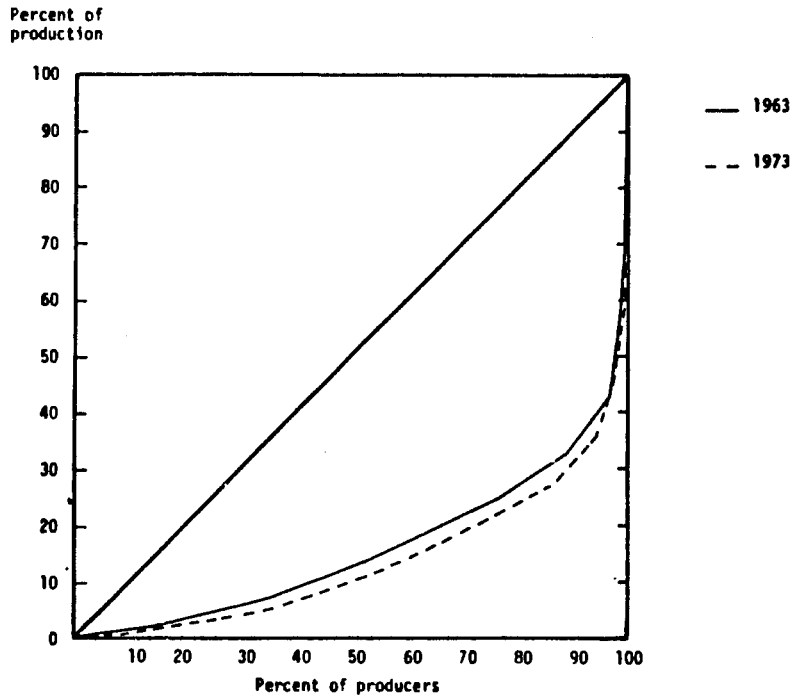
## Distribution of Agricultural Production Among Producers (contd)

FIGURE 6. COSTA RICA: DISTRIBUTION OF CATTLE AMONG CATTLE RANCHERS



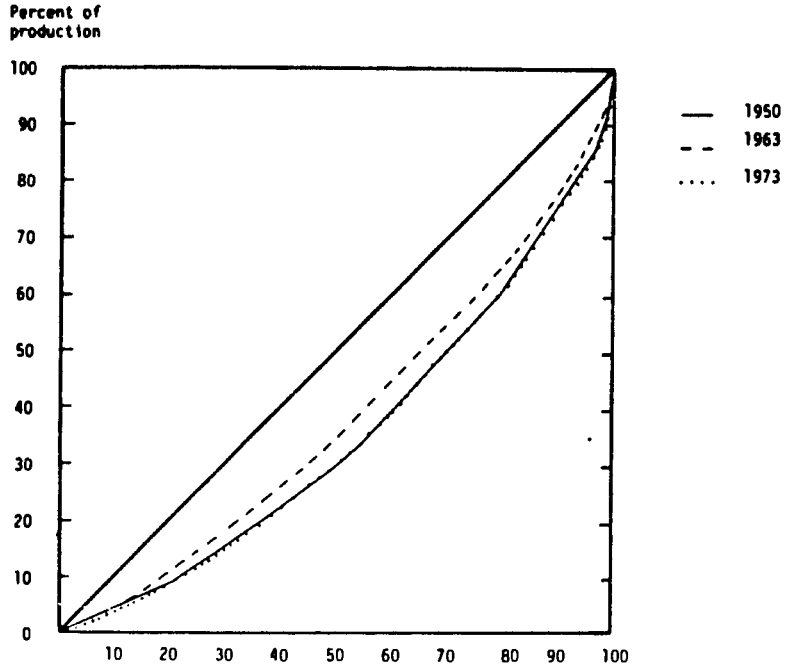

Source: Agricultural Census data: 1950, 1963, 1973.

FIGURE 7. COSTA RICA: DISTRIBUTION OF CANE PRODUCTION AMONG CANE PRODUCERS



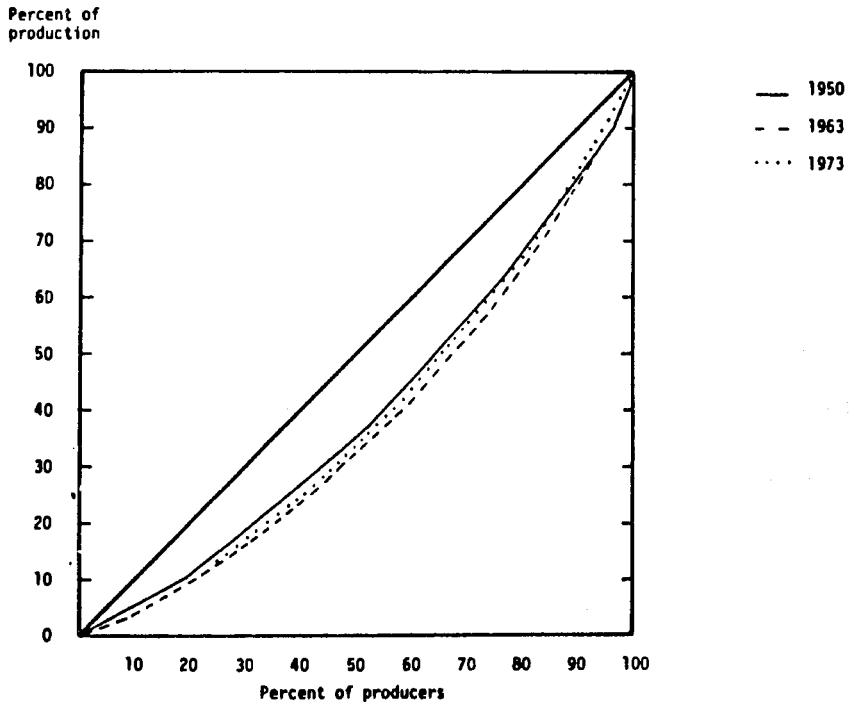

Source: Agricultural Census data: 1963, 1973.

FIGURE 8. COSTA RICA: DISTRIBUTION OF CORN PRODUCTION AMONG CORN PRODUCERS




Source: Agricultural Census data: 1950, 1963, 1973.

FIGURE 9. COSTA RICA: DISTRIBUTION OF BEAN PRODUCTION AMONG BEAN PRODUCERS




Source: Agricultural Census data: 1950, 1963, 1973.

The interested reader will note that of those crops depicted in the Appendix Figures, only the production of beans has avoided significant concentration during the period 1963 to 1973. A moderate improvement in the Gini coefficient for bean production is apparent from Appendix 9. It is a modest improvement however, and the coefficient for 1973 is somewhat greater than that for 1950. One might also note that, of the crops reviewed, only beans have decreased in value over the period 1960-75:

Table 6. Selected Yearly Growth Rates of Value Added in Agriculture, 1960-1975

| | | | |
|---|---|---|---|
| All Agriculture | 5.4 | Rice | 3.9 |
| Coffee | 3.8 | Corn | 2.3 |
| Bananas | 12.1 | Beans | -2.9 |
| Sugar Cane | 6.5 | Beef | 4.4 |

Source: IBRD.

If the production of certain crops had become less concentrated, then possible differences in crop mix between large and small farmers would preclude any generalizations regarding the overall concentration of production and, by inference, of farm income. However, since the production of all crops except beans has become more concentrated, and since bean production has been declining in value, we may conclude that non-

wage, non-salary income in the agricultural sector has probably become more concentrated over the past two to three decades. In any case, the data on the distribution of land and of production clearly do not suggest that agriculture was characterized by an improvement in income distribution between 1961 and 1971.

5. The Concentration of Industrial Production

Incomplete information is available on the extent of concentration of industrial production. Some indicators are available from Census of Manufacturers for 1964 and 1975. We may note for example, that while 5,808 establishments employing 33,254 people in 1964, only 2,870 establishments employing 55,574 people were reported in 1975. The number of firms employing 50 or more people grew from 88 to 250 in the same period.

Even in the case of small-scale industry, it is reported that the number of clothing manufactures fell from 849 -- each employing 3.1 employees in 1964 to 476 -- each employing 12.4 employees in 1975. Analogous figures for shoe manufacturers are 329 establishments averaging 4.0 employees in 1975.

Although it would be desirable to have this type of information available exclusive of the San José Area to substantiate our hypothesis, the national trend of concentration of industrial production may suffice to support our negative conclusion that no massive redistribution of income among manufacturers took place between 1961 and 1971.

## Conclusions

The 1961 figures were originally published by the Economic Commission for Latin America (ECLA). An evaluation of the data suggests that figures for Costa Rica were not derived from any primary sources but are "ECLA estimates" of the country's income distribution. It is known that neither national household income surveys nor Population Census reporting income data were conducted prior to 1963. In fact, a later ECLA reference document presented to the Working Group on Income Distribution, Consumption and Wealth Statistics, in Santiago, Chile in November 1971 makes no mention of national income distribution figures for 1961. This document served as an inventory of possible data sources, and included references of the previously cited 1949, 1958, and 1961 San José surveys. These estimates were probably derived from national accounts, sectoral output and employment figures, etc. They do not, however, seem consistent with subsequent empirical work and may therefore be misleading.

In summarizing our findings from the evidence reviewed above, we can conclude that Costa Rica has not experienced a significant improvement in income distribution since 1961. The tendency, if any, seems to have been in the direction of a slight concentration from a comparatively favorable initial position.

**Data Sources on the Distribution of Income in Costa Rica, by Reference Year and Coverage**

1949 Direccion General de Estadística y Censos Family income within San Jose city limits/

1958 Dirección General de Estadística y Censos. "Ingreso y Gastos de las Familias del Area Metroplitana de San José." Family Income within the San Jose Metroplitan Area. Reproduced in Cespedes, 1973.

1961 Quintana, Carlos. "Analisis del Ingreso Familiar en el Area Metropolitana de San José." Thesis, University of Costa Rica, 1962. Family income within San José Metropolitan Area.

1963 United Nations Economic Commission for Latin America. Economic Survey of Latin America, 1968, 1970; and, Income Distribution in Latin America, 1971. Family income: national, agricultural, non-agricultural.

1963 Dirección General de Estadística y Censos. Population Census of 1963. Wage and salary income by recipients: national and by provinces.

1971 Cespedes, Victor Hugo. Costa Rica: La Distribución del Ingreso y Consumo de Algunos Alimentos, 1973. Family income; national, San Jose Metropolitan, other urban areas, rural.

1973 Dirección General de Estadística y Censos, Population Census of 1973. Wage and salary income by recipients. National and by provinces.

1973 Baldares, Manuel. Distribucion de los Sueldos de Costa Rica, Instituto de Estudios Sociales en Población, Universidad Nacional, 1976. Analysis of 1963 and 1973 data on wages and salaries.

1974 Cespedes, V. H. and Tristan, M.V., La Distribución del Ingreso en Costa Rica, 1977. Family Income: San José Metropolitan Area and other urban areas.

## List of Tables

Figure 1. Basic Needs - Oriented Development Policies - Schematic

Table 1. Indicators of Development Performance - Selected Countries.

Table 1a. Comparative Data on Household Income Distribution - Selected Countries

Table 2. Economically Active Population by Sector of Employment, 1950, 1963, 1973.

Figure 2. Costa Rica: Geographic Regions (Map)

Table 3. Indicators of Housing Conditions in Costa Rica, 1963-1973.

Table 4. Per Capita Expenditures on Public Education in Central America.

Table 5. Costa Rica: Percent of Public Expenditures Devoted to Education, 1951-1975.

Table 6. Costa Rica: Demographic Indicators, 1927-1970.

Table 7. Costa Rica: Rural Health Program Indicators, 1974-1977.

Table 8. Asignaciones Familiares - Funding by Sources, 1977-1982.

Table 9. Asignaciones Familiares - Percentage Distribution of Expenditures, 1978-1982.

Table 10. Costa Rica: Ratio of Highest to Lowest Minimum Wages - Various Industries, 1972-1976.

Figure 3. Costa Rica: Wholesale Prices, 1971-1977.

Figure 4. Costa Rica: Selected Minimum Daily Wages, 1971-1977.

Table 11. Costa Rica: Value of Exports, 1950-1973 - Percentages.

Table 12. Costa Rica: Value of Exports, 1950-1973 - Millions of Current U. S. Dollars.

Table 13. Percent of Distribution by Number of Firms and Value of National and Foreign Investment in Costa Rica, Cumulative, 1960-75.

Table 14. Costa Rica: Imported Raw Materials and Intermediate Goods (RMIG) as Percent of Total RMIG in Industrial Production by Value.

## Acronyms Used

| | | |
|---|---|---|
| IBRD | - | International Bank for Reconstruction and Development (World Bank) |
| IDB | - | Inter-American Development Bank |
| PQLI | - | Physical Quality of Life Index |
| INVU | - | Instituto Nacional de Vivienda y Urbanismo |
| CABEI | - | Central American Bank For Economic Integration |
| CCSS | - | Caja Costarricense de Seguro Social |
| OFIPLAN | - | Oficina de Planificación Nacional |
| ITCO | - | Instituto de Tierras y Colonización |

DN
ARC
1043/79