GROWING ECONOMIC AND SOCIAL DISPARITIES IN CUBA: IMPACT AND RECOMMENDATIONS FOR CHANGE

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EXECUTIVE SUMMARY

I. Introduction

Until 1989 Cuba had one of the most egalitarian economies and societies in Latin America, but the excessive emphasis in equality caused lack of incentives to work, labor absenteeism, declining labor productivity and erosion in the value of money. In the 1990s, the collapse of the USSR and the socialist camp, combined with ill-conceived domestic economic policies, provoked the most severe socioeconomic crisis under the Revolution and prompted the implementation of moderate, zigzagging market-oriented reforms. These changes resulted in significant increases in income inequality and other socioeconomic disparities, which have reversed many of the previous accomplishments. Although hard data are extremely difficult to get on this matter, the paper is based on a comprehensive collection of statistics, documents, surveys, scholarly articles and interviews conducted by the author. It analyzes the impact of the market reforms on economic and social disparities in 1990-2002, and proposes measures to alleviate them in the future based on two scenarios, both involving a further move to the market but one considerably stronger that the other.

II. Growing Disparities and their Impact

Eight types of socioeconomic disparities are documented. (A) Income and Wealth: (1) Income: real average wage in the state sector shrank 44% but extreme salary/income differences grew from 829 to one in 1995 to 12,500 to one in 2002. (2) Foreign remittances: are received by 50-65% of the population, an estimated average of US\$103 annually per capita, similar to the average state wage in pesos, but blacks get only US\$31. (3) Bank accounts: 3% of these accounts have 46% of total deposits (more than 10,000 pesos), while 66% of the accounts only have 2% of the deposits (less than 200 pesos). (B) Regressive Taxes: the tax reform of 1994 generated a shift from direct to indirect taxes (56% of income, mostly sales taxes); dollar remittances, and earnings by those illegally employed don't pay taxes, resulting in a regressive impact on distribution. (C) Deterioration and Disparities in Social Services: (1) Healthcare: deterioration in key indicators (morbidity, maternal mortality, malnutrition, infants born below weight) afflict immense majority of population, but political leaders, the armed forces and internal security are protected through separate special installations and care. (2) Education: real budget expenses fell more than 38%, enrollment at the secondary level shrank 10% and at the higher level by 52%, jeopardizing future development; children of the elite are protected though better schools. (3) Social security pensions; average real pension dropped 42% and the supplementary safety net (subsidized food, adequate free healthcare, cheap public utilities) has severely deteriorated; ages of retirement are very low, workers don't contribute, the deficit and fiscal subsidy are staggering and the growing private sector is not covered; the armed forces and internal security have a separate, privileged pension scheme and receive food and other goods. (4) *Housing*: the housing deficit has grown to 1.6 million, and 39% of the existing stock don't meet habitability standards; there are significant differences in the quality of housing in Havana neighborhoods and with the rest of the provinces. (D) Regional Disparities: the City of Havana has better standards than the poorest eastern provinces (Las Tunas, Guantanamo, Granma), the latter endures higher poverty and unemployment, lower investment, worse housing and access to water and sanitation, and proportionally lower physicians and hospital beds. (E) Racial Disparities: blacks receive less than one half the dollar remittances received by whites; blacks are concentrated in poor neighborhoods and discriminated in employment at tourist facilities. (F) Discrimination vis-à-vis Foreigners: Cubans do not have access to first-rate healthcare available to foreign patients who paid in dollars, to tourist hotels and restaurants, and cannot operate their own business while the number of foreign joint enterprises is growing. (G) <u>Differences in Satisfaction of Basic Needs</u>: declining real wages and pensions, cut in provision of rationed goods to 10 days per month, increase in prices in state dollar shops and free agricultural markets have led to increasing poverty; the average cost of the food basket rose 113%, and daily consumption of calories and vitamin declined below minimum needs. (H) <u>Poverty and Social Welfare</u>: Cuban estimates of poverty incidence ("population in risk") in Havana range from 15% to 67%; real social expenditure per capita dropped 40%, gratuitous social services and subsidies are not targeted on the poor but given to all the population, and the expansion in income and wealth differences have aggravated socioeconomic inequalities.

III. Recommendations for Change

Seven types of policies are recommended for a future transition under two scenarios: medium term (modest economic changes within the current regime) and long term (collapse of the regime and much stronger transition to the market). (A) Overall Macroeconomic Reforms: it is essential to move forward to the market but it is very difficult that the current regime even undertake reforms a la China o Vietnam (specific policies are suggested in that case); in the second scenario Cuba would move faster and deeper into a market economy (ibid). (B) Overhaul of the Tax System: the following policies are recommended in both scenarios but with a better chance in the second: (1) Making the tax system more progressive: establish a general progressive income tax, careful evaluate the VAT before implementing it, maintain taxes on tobacco and alcoholic beverages, introduce excise on hydrocarbons and tax on tourism. (2) Taxing savings and remittances. (C) Changes in Social Services: (1) Healthcare: maintain the national health system but reformed to make it financially solvent, improve its efficiency and quality of services, allow the participation of private activities and eliminate unfair inequalities; target the poor and lowincome groups for free services (other specific measures are recommended). (2) Education: maintain a strong public and free educational system but reformed as in healthcare, adjust education to the demand of a competitive world market, provide proper incentives to train needed technicians and professionals, as well as to discourage enrollment in those fields where there is a surplus. (3) Social security pensions: raise the age of retirement to 65 regardless of sex, reintroduce worker's contribution, conduct financial-actuarial study, establish a minimum pension, facilitate extension of coverage to the expanding private sector, create an optional supplementary fully-funded scheme for those that can afford the contributions. (4) Housing: provide freedom and incentives to the population to repair their homes, trade them and build new ones; poorest dwellers should be allowed to stay in their hoses or be granted a means-tested housing allowance; provide small loans to self-construct and buy new homes. (E) Copying with Remaining Racial Disparities: open public national discussion on the issues of racial discrimination and ways to solve them at schools, jobs and the news media, allow blacks to organize associations and movements to defend their rights. (F) Introduction of Social Safety Net: shift from indiscriminate subsidies (food, healthcare, education) for all the population to targeted aid from those in need, though temporary income supplements, flat and means-tested. (G) The Need of Foreign Aid: the recommended reforms will require economic and technical aid from international and regional organizations; under the first scenario that possibility would be very limited or impossible but would increase substantially under the second scenario; the Club of Paris and other creditors should consider condoning all or part of Cuba's debt provided that needed socioeconomic reforms are implemented.

I. INTRODUCTION

Until the end of the 1980s Cuba had one of the most equalitarian economies and societies in Latin America. Policies in pursuit of that goal were fairly continuous since the beginning of the Revolution, although there were two stages when the emphasis on egalitarianism reached zeniths (the "Moral Economy" or "Revolutionary Offensive" of 1966-1970, and the "Rectification Process" of 1986-1990) and others stages when more moderate policies were applied. And yet the excessive emphasis in equality brought adverse effects such as erosion in the value of money, lack of incentives to work, labor absenteeism and declining labor productivity.

The collapse of the USSR and the socialist camp at the start of the 1990s, combined with ill-conceived domestic economic policies, provoked the most severe socioeconomic crisis under the Revolution (GDP fell by 35% and foreign trade by 75%) and led to a moderate economic reform. It has implemented the following timid policies toward the market, although with several reversals and a virtual stand still since 1996: (1) legalization of the possession and circulation of hard currency—mainly dollars including remittances from Cubans living abroad and more flexibility in their visits to the island, as well as government dollar shops and currency exchange agencies opened to the population; (2) authorization of specific types of self-employment, although tightly controlled, including the operation of small restaurants, private taxi drivers, etc; (3) transformation of state farms into state-controlled cooperatives (UBPC), granting of small land parcels to families and reintroduction of free agricultural markets (as well as artisan markets); (4) fiscal measures to reduce the budget deficit, such as new taxes, increased public-utility rates, reduction in state subsidies and some free services, a raise in consumer good prices and the cut in rationing quotas that previously provided essential albeit meager food to the population; and (5) a new foreign investment law with incentives for foreign capital, which led to various types of joint ventures, particularly in tourism and mining (see Mesa-Lago 2000).

The reform halted the economic decline and promoted a recovery, although at the end of 2001, GDP per capita was still 23% below the 1989 level and that was true also of most products and services, except for oil, nickel and tourism; furthermore, there was a slowdown of growth in 2001 and the first quarter of 2002 (Mesa-Lago 2001, 2002). On the other hand, the reform resulted in significant increases in income inequality and other economic and social disparities, which have reversed many of the previous accomplishments. In 1993, when the reforms began, Fidel Castro stated: "One of the things for which the Revolution can be reproached is that it brought too much equality, it managed to establish egalitarianism and this had to be rectified because is wasn't working and it works even less in a situation of poverty. The more poverty is, the less egalitarianism works ... These changes [the reforms introduced] were inevitable and we have to make some more which foster individualism, selfishness, make the value of money more important, [they] have alienating effects, all of this is a fact" (Castro 1993b: 4).

Data on economic and social disparities in Cuba are extremely difficult to get. because the government has never published statistics on income distribution and is reticent to release information on inequalities that may debunk one of the principal selfproclaimed accomplishments of the Revolution. The statistical yearbook published since the mid 1960s lacks hard data on economic and social inequalities. In the last 44 ½ years, only two population census were taken (1970 and 1981) and their data on income, housing and other variables are grossly insufficient to undertake a sophisticated analysis on inequalities (the 1970 census did not publish data on race although it was included in the questionnaire). After 21 years without a census, the third one under the Revolution is scheduled for September of 2002, but its publication will take at least one year. Because of these limitations, this paper will rely on indirect statistics, as well as qualitative evaluations based on public documents, surveys, scholarly articles published in Cuba and elsewhere, and interviews with recent visitors and immigrants from Cuba. The paper analyzes the reforms introduced in the 1990s and their impact on growing economic and social disparities, and proposes measures to alleviate such disparities in the future when a farther move to the market occurs.

II. GROWING DISPARITIES AND THEIR IMPACT

This section reviews the following socioeconomic disparities and their impact in 1993-2001: income and wealth, taxes, social services, provinces, race, satisfaction of basic needs and poverty.

A. Income and Wealth Inequalities

1. Income

The Cuban government has never published statistics on income distribution and the only available data are rough estimates of dubious reliability by two foreign scholars for selected years in 1962-1986. There is information available, however, on real wages in the state sector in the 1990s: (1) based on the CPI a Cuban scholar deflated the nominal wage in 1989-1998 and estimated a decline of 44.4% in the average real wage from 131 to 73 pesos in that period (Togores 1999), a decrease from \$20 to \$3 according to the CADECA exchange rates²; and (2) ECLAC estimated that real average wages in 1989-1998 declined 45.2% (ECLAC 2000a; for a comparison of the two estimates see Mesa-Lago 2001). At the same time that salaries in the state sector declined sharply, income in the small but expanding private sector grew significantly.

Income of artists and musicians who have international fame, private farmers, owners of small restaurants (*paladares*), private taxi drivers, self-employed workers,

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¹ In visits to Havana in 1980 and 1990 I asked Cuba's main statisticians why they did not publish data on income distribution that could support the generalized view on the island equality, and they answered that were not interested.

² The official exchange rate is par: 1 peso for \$1 (U.S. dollar); CADECA are state exchange agencies created in October 1995, which charge a rate considerably higher that the official rate, slightly lower than the black market rate.

employees in tourist facilities, speculators in the black market and similar activities have rose dramatically. Conversely, employees in the state sector (67% of the total labor force in 2000) have suffered a dramatic decline in their salaries. Based on interviews of recent Cuban visitors and immigrants in the United States and converting the Cuban peso into U.S. dollars at the CADECA exchange rate in 1995, I estimated monthly incomes in several occupations in Cuba as follows: average wage earner \$6; teacher \$8 to \$9; surgeon or university professor \$11 to \$12; tourist taxi driver \$100 to \$467; private farmer \$187 to \$311; owner of small restaurant \$2,500 to \$5,000. Income inequality expanded significantly in the 1990s: in 1989 the maximum wage differential was 4.5 to one, in 1995 the extreme ratio I calculated between the highest income earner and the average wage was 829 to one (Mesa-Lago 1998). Cuban scholars have estimated that in 1994 the lowest income-worker in the informal economy made in a day the monthly average wage of a state worker (Carranza, Gutiérrez and Monreal 1995).

I have updated my measurement of monthly income inequalities to March-April of 2002, based on interviews conducted with recent Cuban visitors and immigrants in Miami and Madrid (see Table 1). The conversion of pesos to dollars was made using the CADECA exchange rate in those months (26 pesos per \$1). The table separates: (a) the public sector, where the range went from \$4 for the lowest salary/pension to \$23 for a cabinet minister (\$31 for the best paid policemen in the special corps protecting tourists from robbers), and (b) the private sector, where the range went from \$40 for a domestic servant in an exclusive neighborhood to \$50,000 for the owner of a *paladar*. Although the measurements of 1995 and 2002 are not technically comparable, they suggest a significant expansion in income inequality: the extreme income difference was 12,500 to one in 2002, compared with 829 to one in 1995.

Not shown in Table 1 are rates charged usually in dollars by self-employed who work at clients' homes such as electricians, plumbers, auto repairmen and so forth, which vary greatly. In an attempt to secure needed skilled manpower in strategic sectors, in 1994, the government started to pay bonuses in dollars to workers in tourism, mining, electricity, ducks and tobacco. In 2000, 1.2 million workers (about one fourth of the labor force) received those bonuses (an estimated average of \$19 monthly) and 1.5 million got rewards in kind such as food and clothing (Rodríguez 2000; Triana 2000). And yet, these incentives (and the even poorer stimuli at the UBPCs) cannot compete with those available in the private sector, hence, the government has steadily increased its control, taxes and inspection on the self-employed, owners of *paladares* and other private workers. Members of the armed forces receive monthly allocations of food and also can buy clothing and other goods at low prices.

³ A survey on the economic conditions of households in the city of Havana in March 2000 found: (a) the average income per capita was 198 pesos (\$9.90 at the CADECA exchange rate); (b) 53.4% of households had a per capita income between 50 and 150 pesos (\$2.50 to \$7.50) and (c) 14% had income less than 50 pesos (Oficina Territorial de Estadísticas de la Ciudad de La Habana, *Encuesta sobre la situación económica de los hogares*, "cited by Pérez Villanueva 2001).

⁴ I asked a dozen interviewees what was the lowest and highest salary/income of the various occupations in pesos and/or dollars, then compared all the answers and found them to be fairly consistent; this cannot be considered, however, a formal survey.

Table 1 Monthly Income in Havana-Cuba (Pesos and U.S. Dollars): March-April 2002

Occupations	Pesos	U.S. Dollars ^a	
_	(start & top)	(26 pesos=\$1)	
State Sector			
Lowest pension	100	4	
Lowest salary	100	4	
Teacher (elementary and secondary)	200-400	8-15	
University professor	300-560	12-22	
Engineer, physician	$300-650^{\rm b}$	12-25	
Garbage collector	300-500	12-19	
Policemen (regular)	200-500	8-19	
Policemen (security for tourists)	700-800	27-31	
Officer armed forces	350-700	13-23	
Cabinet Minister	450-600	17-23	
Private Sector			
Domestic servant	520-1,040 ^c	20-40	
Private peasant	$2,000-50,000^{e}$	77-1,923	
Transporter (truck with 20-60 seats)	10,000-20,000	385-770	
Prostitute (<i>jinetera</i>)	d	240-1,400 ^g	
Rentist of room, apartment or home	d	250-4,000	
Artists and musicians (known abroad)	d	600-6,000 ^f	
Owner of paladar	d	12,500-50,000 ^h	

^aRounded.

Source: Interviews conducted in Miami and Madrid with recent visitors and immigrants from Cuba.

Incentives paid to those employed in foreign-operated enterprises or joint ventures are considerably better than in the state sector, usually 15 to 20 convertible pesos⁵ per month and a basket with food and other goods. Those working in the Sherritt

^b Old physicians may have signed an agreement with the government to allow a private practice, which will earn 10 to 20 times their salary in a public job.

^c Those working in exclusive neighborhoods such as Miramar charge the maximum; in addition, they receive room and board.

^d Normally charge U.S. dollars.

^e Those with the smallest plots earn the lowest income and those with larger plots or crops in high demand or raising hogs earn the highest income.

f Unknown artists earn \$10 to \$13 monthly. Conversely, Compay Segundo (Buena Vista Social Club) charges \$6,000 net for one night performance; Silvio Rodríguez, Jorge Peregoría and the Van-Van have contracts paying as much as \$200,000 with a percentage of the income going to the government

g Monthly estimate based on \$10 to \$50 per night, \$70 to \$350 per week.

^h Based on \$500 to \$2,000 daily, very few are left earning the highest sum.

⁵ The "convertible" peso was introduced in the mid 1990s as an alternative domestic currency to the regular peso and officially exchanged par with the U.S. dollar, but the population prefers the latter because of its

International nickel plant in Moa (Pedro Soto Alba) receive \$30 to \$35 monthly and managers \$50. Many of these enterprises also pay additional monthly sums "under the table" to keep good workers, for instance: \$20 to \$25 to blue collars, \$100 to \$150 to secretaries, \$200 to \$300 to salespersons, and \$600 to \$800 to managers; salespersons and managers also earn commissions on collected sales, an enterprise car and 200 liters of gasoline. High officials of the Export/Import Bank (CIMEX) are paid fully in dollars (Interviews conducted in Miami and Madrid, March-April 2000).

The explained income inequalities and lack of proper incentives in the state sector have several adverse effects: regressive income distribution, low labor stability, decrease in productivity (measured in thousand pesos per worker, it declined 30% in 1989-1993 and partly recovered but, in 2000, was still 12% below the 1989 level; CEPAL 2000a, 2001b), decline in enrollment particularly in higher education (see section II-C-2) and a rise in crime.⁶

2. Remittances

In 1993 the government authorized the reception, possession and circulation of foreign currency (essentially dollars) and later on the opening of bank savings accounts in dollars, measures that resulted in a dual monetary system. Cubans living abroad (mainly in the United States) began to send remittances to relatives in the island through three different channels: (a) most common is the personal delivery of the cash either by relatives of Cubans visiting the USA or by Cuban-Americans visiting the island; (b) individuals who travel to Cuba transport dollars either as a favor or charging a fee (*mulas*); and (c) direct transfers can be made by wire or agencies for a fee. The first two types cannot be limited, while the third has a maximum set by the U.S. government of \$300 annually; although there is no accurate information, the conventional wisdom is that most remittances are sent through the first two channels.

The amount of the remittances cannot be precisely calculated because of the informal channels mainly used; indirect ways to do it is by Cuba's state dollars shops (tiendas de recuperación de divisas: TRD) that sell merchandise to Cubans and visitors and by the CADECA agencies that exchange currency. According to a well-known Cuban economic scholar, "official Cuban statistics on the value of remittances do not result from a real register of transactions but is merely an estimate with a significant margin of error" and they ranged from \$300 to \$500 million in 1995-1998 (Monreal 1999: 50, 53). ECLAC has published the following series, which obviously suffers

generalized acceptability. It is not actually a "convertible" peso in the sense that its value is not set by supply and demand in the world market.

⁶ Rising inequalities combined with massive arrival of tourists have caused an increase in crime, while the opening of the market to foreign investment has led to fraud and corruption among public officials. Managers and workers of state enterprises steal goods for their own consumption or to sell in the black market or as inputs for the self-employed; stealing from crops is frequent also. In 1997-1999, 6,000 policemen were added only to the City of Havana, drug trafficking and pimping became punishable by death and prostitutes were cleared for a while. A few scandals of bribery by government officials have been published in the press and severe sanctions imposed but this is only the tip of the iceberg (Mesa-Lago 2000; Trumbull 2000).

from the same flaws as the Cuban data (in millions): 573 in 1995, 630 in 1996, 670 in 1997, 690 in 1998, 700 in 1999 and 720 in 2000 (CEPAL 2001b). It is said that the amount has declined since September 11, 2001 due to the interruption/decrease in international travel and the world recession. In spite of the uncertainty of these figures, it seems that remittances are the major source of hard currency in Cuba after gross revenue from tourism, surpassing the value of nickel and sugar exports (ONE 2001). Also speculative are data on the percentage of Cubans who receive remittances, for instance, 32% and 49.5% in 1997, 56.3% and 65% in 1998, and 62% both in 1999 and 2000 (CEPAL 2000b; Togores 1999; Pérez Villanueva 2002). In 1999, sales in dollar shops were reported as \$1 billion, hence, \$300 more that the remittances estimated by ECLAC for that year; the difference was then considered to come from bonuses paid in dollars, earnings of *paladares*, house rentals, black market operators and so forth (Trumbull 2000).

If the remittances in 2000 were \$720 million and 60% of the population (6.7 out of 11.2 million) received them, an average of \$103 annual per capita could be estimated, that was close to the average wage in the state sector at the CADECA exchange rate (21 to \$1) at the end of the year (2,556 versus 2,808 pesos). This would mean that the average receiver of remittances could either stay home and have the same income of the average state worker or double his/her income if employed. Obviously there are Cubans who receive more than the guesstimate of \$103, others who are granted less and still others who get nothing, with significant adverse impacts, such as regressive income distribution and disincentives to work, particularly in a government job. The question of how remittances are distributed is impossible to answer herein but a reasonable hypothesis is that most recipients live in Havana and are whites. Information gathered in interviews with recent visitors and immigrants from Cuba consistently indicates that the farther one is from the capital city, the less the remittances received; this seems to be true even in Santiago, the second largest city, which is in the most eastern part of the country. Concerning race, according to the U.S. census of 1990, 83.5% of Cuban immigrants living in the United States were whites and virtually all the rest (16.5%) were blacks. According to the latest Cuban census of 1981, 66% of the population was white and 34% nonwhite, basically black, but it has been argued that the census underestimated the black population. Assuming that both U.S. and Cuban proportions were correct and had not changed by 2000, and that remittances are evenly distributed regardless of race, \$668 million (out of a total \$720 million) were received by whites in Cuba (\$81 per capita) and \$120 million by blacks (\$31 per capita). If the proportion of the black population in Cuba is indeed higher that given by the 1981 census, the gap between the two per capita figures would be even wider (the idea for this estimate came from De la Fuente 2001).

When the authorization to receive dollars from abroad was fresh, Fidel Castro criticized the inequalities and privileges generated by his policy but justified it nevertheless: "We need understanding, and not eat our hearts out. That would never be the correct attitude for a revolutionary ... revolutionaries make sacrifices throughout their lives" (Castro 1993a). A decade later, even when the recipients of remittances are probably the majority of the population and the "revolutionaries eating their hearts out"

are a minority, this disparity continues to irritate. In order to compensate it, in 2001 the Communist Youth proposed that recipients of remittances be denied access to free health and education as well as subsidized goods through the rationing system, but the proposal was rejected probably because of difficulties in implementation for lack of control of who are those receiving remittances (Leon 2002).

3. Wealth: Bank Accounts

No data are available on wealth distribution in Cuba but, according to a Cuban economist: "The structure of the banking accounts show an expansion of the wide gap among various groups of savers, which in turn is a reflection of differences in income distribution ... This implies inequalities in opportunities, which five years ago did not depend on income differences but on just economic and social opportunities to individuals, such as education ... During the crisis, factors such as income and wealth have had negative effects and diminished the impact of equal opportunities" (Togores 1999: 11). We have already analyzed income inequalities; an indirect measure of wealth in Cuba is bank savings accounts in branches of the state *Banco Popular de Ahorro*: in 1994, 54% of the population had 6.3 billion pesos in those accounts, but in 2000 these figures had declined to 37% of the population and 5.2 billion pesos (based on ONE 2001 and Pérez Villanueva 2002), and the concentration of deposits in those accounts had increased considerably.

Table 2
Distribution of Bank Savings by Amount of Deposits: 1994 and 1997
(in pesos and percentages)

Bank Savings (in pesos)	Up to 200	201- 2000	2001- 10,000	More 10,001	Total
1994					
Total accounts (%)	61.7	24.2	11.9	2.2	100.0
Total savings (%)	4.4	17.8	41.8	36.0	100.0
1997					
Total accounts (%)	65.9	20.9	10.2	3.0	100.0
Total savings (%)	2.4	12.6	38.6	46.4	100.0

Source: Togores 1999.

Table 2 compares the percentage distribution of bank savings by the level of deposits demonstrating their increasing concentration: while in 1994 61.7% of the accounts had deposits up to 200 pesos (4.4% of total savings) and 2.2% had deposits above 10,000 pesos (36% of the total), in 1997 65.9% of the accounts had deposits up to 200 pesos (2.4% of total savings) and 3% had deposits above 10,000 (46.4% of total savings). In 1994 there were no accounts above 50,000 pesos but, in 1997, 0.1% of the accounts had deposits above that sum, equivalent to 5.3% of total savings. It was not possible to get more recent complete data on savings but, in 2000, 13% of all accounts had deposits above 2,000 pesos equivalent to 85.4% of total savings, compared with 14%

and 77.8% respectively in 1994, a clear increase in the concentration (Pérez Villanueva 2002).

Interest rates paid for CDs in pesos (700 million in 2000) ranged from 3.5% for 3 months to 7.5% for 36 months (75% of total CDs), rather high rates in view of the closed Cuban economy and its very low rate of official inflation (BCC 2001). In addition, it is estimated that there are \$200 million in dollar accounts and that part of the population hoards a large amount of dollars at home (Ritter 2002). Interest rates for CDs in dollars ranged from 1.75% for 6 months to 2.75% for 36 months in 2000 (CEPAL 2001b). High interest rates contribute to the increasing concentration of bank deposits and CDs (Triana 2000).

B. Regressive Taxes

Prior to the crisis, government revenue was mainly generated by non-tax revenue, such as the transfer of state enterprise profits, but also by indirect turnover taxes ("circulation" taxes) collected by state enterprises, as well as contributions for social security and labor benefits and foreign trade taxes; only 1.7% came from direct "population taxes" (charged on some public utilities). The crisis provoked the closing of a large percentage of enterprises or a significant decline in their output and, hence, government revenue plummeted. To cope with this problem, a tax reform law was enacted in 1994 that changed the sources of fiscal revenue: a sales tax replaced the turnover tax, and other taxes were imposed on alcohol and tobacco, profits of all enterprises, labor and social security (paid by enterprises), exploitation of natural resources (e.g., mining), hard-currency earnings from abroad (excluding remittances), real estate, inheritance and public utilities. Although a workers' contribution for social security was included in the law, its enforcement was suspended for social and political reasons. Several taxes were later imposed on self-employment, *paladares*, house rental for tourists and other private activities (Mesa-Lago 2000).

Table 3
Percentage Distribution of Tax Revenue by Source: 2001

Taxes	%
Indirect	55.7
Sales	29.8
Alcohol and tobacco	20.5
Public utilities and services	5.4
Direct	44.3
Profits	15.4
Social security	11.0
Labor ^a	9.1
Airport, highways & others	6.2
Personal income	2.6
Total	100.0

^a Sickness and maternity paid leave, labor safety and hygiene.

Source: Based on MINFP 2001; CEPAL 2001b

The essential outcome of the tax reform was a shift from direct to indirect taxes. thus in 2001 the percentage distribution of tax revenue was as follows: 56% from indirect taxes, out of which 30% was on sales, 21% on alcohol and tobacco and 5% on public utilities (electricity, water, telephone); and 44% from direct taxes, 20% from social security and labor contributions, 15% from profits, 6% from various fees and only 2.6% from personal income (see Table 3). The bulk of taxes, therefore, is indirect and has a regressive effect on income distribution because they are proportionally heavier on those who have lower income (Pérez Villanueva 2002). Those who paid personal taxes in 2000 were: 107,000 self-employed workers, 33,830 private transporters, 16,250 artists, 12,000 land lessees, 7,740 small sugar producers and 1,730 operators in the free agricultural markets (CEPAL 2001b). In total, 176,820 workers in the private sector tantamount to less than 4% of the labor force, paid 2.6% of total taxes. The heavy taxes and fees on self-employed workers and owners of *paladares* have gradually reduced their numbers and their contributions, for instance, the number of self-employed declined from 208,500 in November 1995 to 109,562 in 2000 and their tax contributions dropped from 207 to 135 million pesos (Espinosa 2001b). Those who get paid in dollars or receive bonuses in that currency or are illegal self-employed (non registered, probably the large majority in this activity) or speculators in the black market do not pay personal taxes.

C. Deterioration and Disparities in Social Services

Cuban social service policy since the beginning of the Revolution until the end of the 1980s was characterized by continuous expansion in coverage, gratuitous provision and rising costs, except for housing. ECLAC explains: "In part the viability of the social policy was facilitated by the especial and privileged relationship that Cuba had during [three] decades with the socialist countries, particularly with the URSS ... [They] contributed resources that raised the welfare of the population above the level of economies with the same and even higher income levels ... [In addition] there was the political decision of building an egalitarian society." According to ECLAC, such strategy was not exempted from errors that had negative welfare effects, among them the imposition and expansion of rationing, the deterioration of the basic infrastructure, the significant housing deficit, and inefficiencies that did not impede the continuous expansion of free services (CEPAL 2000a: 275-276). I have estimated that, in 1960-1990, Cuba received from the USRR alone \$65 billion, 40% in non-repayable price subsidies and 60% in loans that were not paid. The disappearance of the USSR, the socialist camp and the CMEA provoked the ensuing crisis and have had a severe adverse effect on social services although the government has attempted to protect them (Mesa-Lago 2000). The deterioration in social services and its impact on inequality and other aspects of Cuban society are analyzed below.

1. Health Care

It is widely recognized that, under the Revolution, Cuba significantly improved its health services and standards, but little known that in 1958 Cuba also led Latin America in most of the same indicators. In the 1960s the government established a National Health System (NHS) that rapidly universalized health care to all the population, providing free

services, except for medicines for patients not hospitalized. In the 1980s, the introduction of the Family Doctor Program expanded primary services considerably and made them closer to the patients. From 1959 to the end of the 1980s there was virtually continuous improvement in all health indicators: physicians rose from 9.2 to 33.1 per 10,000 inhabitants, hospital beds from 4.2 to 5.3 per 1,000 inhabitants, the hospitalization rate from 12.6% to 15.5%, and there were declines in the infant mortality rate from 33.4 to 11.1 per 1,000, the maternal mortality rate from 125.3 to 26.1 per 100,000, and the mortality rate of the population age 65 and above from 52.9 to 46.3 per 1,000. Most contagious diseases were either eradicated or became insignificant or dramatically reduced (diphtheria, malaria, measles, rubella, scarlet fever, tetanus, tuberculosis, typhoid fever and polio) although other increased (acute diarrhea and respiratory diseases, venereal diseases, hepatitis and chicken pox). Furthermore, there was a significant reduction in the gap between urban and rural areas, in terms of facilities, personnel and health standards (Mesa-Lago 2000).

The crisis of the 1990s adversely affected health care and several of its indicators. While the rate of physicians continued to increase and that of infant mortality to decline throughout 1990-2001, there was a deterioration in various indicators, usually until 1993-1995 with some improvement later but, in some cases, without recovering the pre-crisis level: the hospital bed rate fell from 5.3 to 4.7 and the hospitalization rate from 15.5 to 11.9, while the maternal mortality rate rose from 26.1 to 55.7, the rate of the population age 65 and over from 48.4 to 55.7 and later to 49.7. Although the large majority of diseases continued to be eradicated, there were further increases in all the contagious diseases that exhibited a rising trend before the crisis, as well as a reappearance of tuberculosis and an increasing rate of AIDs. Causes of this deterioration were: the severe scarcity of medicine, spare parts for equipment, inputs for tests, anesthesia and other essentials; the breaking down of the basic infrastructure of potable water and sewerage which had been neglected before; the lack of prophylactics and the reduction in vaccination, and serious nutritional deficiencies (on the latter see section II-G). These problems have resulted in long waiting periods for surgery and the good but very costly family doctor program lacks the essential medicine to treat its patients. In addition, while real healthcare expenditures per capita increased 162% in 1976-1989, they shrank 75% in 1989-1993 and, in spite of an improvement later, in 1999 they still were 21% below the 1989 level. Finally, inefficiency worsened, thus hospital occupancy dropped from 83.9% to 69.4% and the average days of stay rose from 9.9 to 10.4 although declined to 9.4 in 2000 (Mesa-Lago 2000, 2003; Sixto 2002).

Parallel to the NHS there has been a separate healthcare scheme for the armed forces and the top hierarchy of the government and the communist party, with better services and care than the national system. In addition, the pressure to get badly needed foreign exchange moved the government to the introduction and expansion of paid healthcare for foreigners ("health tourism") who receive excellent treatment. These two schemes have not been affected by the crisis; prior to it they were not so much resented because of the universal, free and high-quality services of the NHS but now, in the midst of severe scarcity of medicine and deterioration of healthcare, they have become an irritant inequality.

Physicians and university graduates are prohibited from practicing their profession as self-employed (they can work in other authorized occupations), which is absurd in view of their surplus, dramatic dive in their state salaries and the need for more personalized care. Nevertheless, physicians graduated before the Revolution and who had a private practice may have been allowed by the government to keep it (most of them have died or retired) and some of those graduated after 1959 do it illegally. Therefore, the population who earn or receive dollars have access to private medicine and can buy all kinds of medical products in the dollar shops, but those who are pay state salaries cannot afford those services and goods, which is another source of inequality.

2. Education

The educational budget in real pesos contracted 38% in 1989-1997, which led to scarcity of educational materials (books, pencils, paper), paralysis of investment and maintenance of the physical plant, deterioration of the equipment and laboratories, lack of spare parts, reduction in transportation and meals, and decline in the quality of services (CEPAL 2000a). Enrollment in primary education decreased slightly from 100% to 99% in 1989-1999, while enrollment in secondary education fell from 90.2% to 74.5% in 1989-1994 and rose to 80% in 1997, still 10 percentage points below 1989 (based on ONE 1998-1999; UNESCO 2001). The children of the elite were largely saved from such deterioration as the best schools (for instance Lenin in Havana) were protected from drastic cuts. In addition, private tutors were hired by high-income groups to teach their children.

Income inequalities already explained (section II-A-1) have inverted the income pyramid: prior to the crisis, physicians, engineers and university professors were at the top of the ladder but now domestic servants, transporters, owners of *paladares* and prostitutes earn several times more, therefore, many professionals have abandoned their jobs and shifted to occupations that are well paid. University enrollment has declined sharply because it does not pay to spend six years studying medicine or five years studying pedagogy and then, after graduation, face serious difficulties to find a job or, if employed, receive a miserable salary in the state sector.

Table 4 shows the decreases in university enrollment between the 1989/90 academic year and the worst decline during the crises, as well as the small increases in 2000/01. Overall enrollment shrank as much as 58% and in 2000/01 was still 52% below the previous level; some fields such as pedagogy fell as much as 70%. As a percentage of the population of university age, enrollment decreased from 23% to 12% in 1987-1997 (Mesa-Lago 2000; UNESCO 2001). The impact of these declines will not be felt immediately, because there is a glut in certain professions such a medicine and teachers, but in the long run it will provoke a shortage of professionals and adversely effect economic growth.

Table 4
Decline in University Enrollment in Cuba: 1989/90-2000/01

Sciences	1989/90	1995/00 ^a	2000/01	% ^b	% ^c
Natural and Math	6,399	4,019	3,828	-37.2	-40.2
Agricultural	11,606	4,680	5,125	-59.7	-55.8
Economics	18,789	4,893	11,061	-74.0	-41.1
Technical	29,819	13,020	14,514	-56.3	-51.3
Medical	37,305	23,457	24,606	-37.1	-34.0
Pedagogy	115,529	35,068	38,892	-69.6	-66.3
Total ^d	242,366	102,598	116,734	-57.7	-51.8

^a Lowest enrollment in the period.

Sources: Based on CEE 1991; ONE 1998, 2001.

3. Social Security Pensions

The state unified, standardized entitlement conditions and centralized the administration of 54 social insurance pension funds (old-age, disability and survivors) existing prior to the Revolution. Coverage was extended from 63% to 91% of the labor force in 1958-1989; only excluded from mandatory coverage were self-employed, private farmers and unpaid family workers who could join voluntarily. By the end of the 1980s the Cuban pension system was probably the most extended, liberal and costly in Latin America. Ages of retirement are 55 for females and 60 for males (among the lowest in the region), salaried workers do not contribute and employers only pay 12% of the payroll (one-fourth of the total contribution paid in comparable countries such as Argentina, Costa Rica and Uruguay), and although the amount of pensions was meager, it was supplemented by an ample safety net (subsidized prices for consumer goods, free health care, free or cheap housing and low cost of transportation and other public utilities) (Mesa-Lago 2000).

The apparently positive features of the pension system turned negative as a result of the crisis and the aging of the population. The non-state sector grew from 5.3% to 19.4% of the labor force in 1989-2000 and only a small segment is covered, the rest is not and as the non-state sector expands coverage diminishes. Self-employed workers can join but paying 12% of their income while state salaried workers pay nothing. The low ages of retirement combined with a steady rise in life expectancy have resulted in the longest average period of pensioners in Latin America: 20 years for men and 26 for women; by 2025 Cuba would have the oldest population in the region: one elder citizen per four persons in the population. Due to the raising cost of living and little increase in nominal pensions, the real pension shrunk 42% in 1989-1998 and the safety net has largely disappeared because of the reduction in rationed goods to 10 days in the month, the increasing cost and difficulties in transportation, and the deterioration in healthcare. The cost of social security in relation to GDP rose from 1.3% to 2.6% in 1986-1998 and the insufficient contribution has provoked a growing deficit (from 26% to 40% of total

^b Percentage of 1995/00 over 1989/90.

^c Percentage of 2000/01 over 1989/90.

^d Excludes humanities, social sciences and physical education.

expenditures) that must be financed by the state. In order to cover expenses, the actual contribution had to be raised from 12% to 20% in 2000, and it must keep increasing as the ratio of active workers to one pensioner dwindles from 6.6 in 1970 to approximately 1.5 in 2025. To cope with these problems the government is discussing a legal draft to reform the system whose main features are: a raise in age to 60/65 in 20 years, introduction of workers contributions (these were approved by law in 1994 but have not been enforced), and the increase in the nominal pension. These measures are grossly insufficient to cope with the system flaws (Peñate and Gutiérrez 2000; Benítez 2001; Mesa-Lago 2003).

In the same way as healthcare, there is a parallel pension scheme in Cuba for the armed forces and internal security, which is much more generous and proportionally costlier than the general system. For instance, if one enters the armed forces at age 17 and accumulates 25 years of service, is it possible to retire at 43, that is, 17 years less than men in the general system; the average pensioner would be retired for 37 years, 12 years more than the years of service. The pension is equal to the last year salary and the pensioner can work in the civil sector, while in the general system the pension is based in the last five years of salary and pensioners cannot perform salaried work in the state sector. It has been estimated that in 1995 this scheme cost as much as the deficit of the entire general system and that to finance it a salary contribution of 118% would be needed (actually the state finances all expenses of this scheme). In 2001 more than 1.4 million pensioners in the general system were receiving an average monthly pension of 110 pesos (\$4.20 at the CADECA exchange rate); estimates of how much they need monthly vary from 190 pesos to buy the essential nutrients (see section II-G) to 432 pesos to cover all basic needs, hence, the average pension provides only from one-half to onefourth. These pensioners cannot survive unless they receive dollars from abroad or are helped by their families, and they are probably the group enduring the most difficult conditions in Cuba today. In contrast, the armed forces/internal security scheme constitutes a costly privilege enjoyed by a tiny minority (Mesa-Lago 2003).

4. Housing

Says a Cuban economist "Housing is recognized as the gravest social problem afflicting the nation ... the accumulated needs [housing deficit] are substantially higher than the new housing construction, among other reasons because of the deterioration in the existing stock" (Triana 2000: 10). Statistical series on housing have been changed several times, which makes difficult to assess annual dwelling construction; in addition, the size and features of the units built have not been released. Even before the crisis (1985), there was a deficit of 880,000 homes; in 1991-1992 the number of dwellings built decreased by one-half in relation to 1990 (cooperative housing shrank 85%), hence the deficit should have surpassed the one million mark. Although the number of units built increased by 20% in 1993-2000 (about 39,000 annually) in relation to 1990, that number not only failed to reduce the existing deficit but increased it, because the growing

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⁷ In 1988, Cuba's statistical yearbook dropped the series of houses without a certificate of habitability built by the population, which accounted for 46% of total houses constructed in 1981-1987 (ECLAC does not include these homes in its series).

population and the deterioration of the existing stock require to construct 100,000 dwellings per year just to keep up with demand (Mesa-Lago 2000; CEPAL 2001b; Bauza and Collie 2002). Table 5 estimates that the cumulative housing deficit in Cuba jumped to 1.6 million in 1981-2000. The latter does not deal with qualitative deficiencies, such as houses that do not meet habitability standards, estimated as 39%, well below the regional average of 54% (Dammert 1997). There are conflicting data on the houses destroyed or damaged by hurricane Michelle in November 2001, the official numbers are 12,579 and 45,000 but other estimate is that 450,000 dwellings were destroyed or damaged; in any case only 20,500 dwellings are planned to be built in 2002 (Rodríguez 2001; Bauza and Collie 2002).

Table 5
Estimate of the Housing Deficit in Cuba: 1981-2000 (in thousands)

		Population	Dwellings	Deficit
1981		9,724	2,290	877
1981-2000		·		
Houses built	794 ^a			
Estimate of houses destroyed (10%)	79			
Net houses added	715			
2000		11,217	3,005	
Difference (2000-1981)		1,493	715	778
Cumulative deficit (1981+2000)				1,655

^a Based on total houses built in 1981-1987 including those without certificate of habitability; in 1988-2000 those without certificate were not reported. If the average of these houses built in 1981-1987 is added to the 1988-2000 houses built, the net houses added increases to 983,000, and the deficit in 2000 is 510,000 for a cumulative deficit of 1.4 million instead of 1.6 million.

Sources: 1981 from Mesa-Lago 2000; 1981-2000 based on CEE 1991 and ONE 1998 to 2001.

There are significant differences in housing among Havana neighborhoods; in those where the high income groups live (Miramar, Nuevo Vedado, parts of Vedado), good and well maintained homes are seen, but in low and middle income neighborhoods (Habana Vieja, Centro Habana, Cerro, la Víbora, etc.), which constitute the majority of the population, houses are in terrible shape often propped up and surrounded by debris of collapsed dwellings. In 1999, out of 575,795 dwellings in the City of Havana, 57% were in "good shape" and the remaining 43% were "so-so" (*regular*) or in "bad shape" but, in old Havana (Habana Vieja), 75% were ranked so-so or bad. In the least two developed provinces (Guantanamo and Granma) the proportion of dwellings in good shape were 34% and 38% respectively (see next section).

Those who earn or receive dollars can buy construction materials, painting and other things needed to maintain and repair their homes or swap them paying considerable sums behind the table to get better houses. Conversely, those who do not get dollars and receive a regular salary in pesos cannot afford those materials and their homes gradually deteriorate and often collapse (the state agency in charge of house repairs is virtually

useless). Because of the government failure to provide housing to the population, not many changes have occurred in the pre-revolutionary distribution of dwellings by race. The majority of blacks, therefore, continue to be concentrated in poor neighborhoods with overcrowded and dilapidated housing, such as old Havana (De la Fuente 2001).

D. Regional Disparities: Provinces

Socioeconomic disparities among Cuba's 14 provinces have been reduced in the last 40 years, but several indicators exhibited in Table 6 demonstrate that still three eastern provinces (Las Tunas, Granma and Guantanamo) are considerably below the remaining eleven, while the City of Havana continues to rank best in the immense majority of indicators. According to a study on poverty done in Cuba, in 1996 the urban population at risk in Havana (11.5%) was half of that of the Oriental provinces (21.7%). which include the three in Table 6. An index that measures how homogenous the 14 provinces are in terms of numerous socioeconomic indicators places Havana as the most homogenous and Granma as the least, followed by the other two provinces. While Havana population is 100% urban, the other three provinces are slightly above 40%. Investment per capita in Havana is three times that of Las Tunas and five times those of Guantanamo and Granma. While 56% of the houses in Havana are in good shape, only 34% are in Guantanamo and 38% in Granma. Home connection of potable water in Havana is 99% but decreases to 48% in Las Tunas and Guantanamo. Access to sewage in Havana is 64% but 18% in Las Tunas and 26% in Granma. There are 91 physicians per 10,000 inhabitants in Havana but only 41% to 43% in the other three provinces; and 9.2 hospital beds per 1,000 inhabitants in Havana but 4.0 to 4.4 in the other three provinces.

Table 6
Socioeconomic Disparities Among Extreme Provinces: 1996-2000

	City of	Las	Guantá-		
Indicators of Disparity	Havana	Tunas	namo	Granma	Cuba
Urban population at risk, 1996 (%)	11.5	21.7°	21.7°	21.7°	14.7
Human Development Index, 1996 a	0.7278	0.4348	0.3724	0.4641	0.7260
Index of homogeneity, 1997 ^b	1.000	0.282	0.000	0.034	
Urban population, 2000 (% of total)	100.0	41.1	42.3	40.2	24.7
Investment per capita, 1997 (pesos)	435	130	87	89	
Housing in good shape (% of total)	56.1	44.3	33.8	38.0	
Water home connection, 1997 (%)	98.6	48.0	48.1	65.5	93.8
Access to sewage, 1997 (%)	63.7	18.1	38.4	25.7	
Physicians, 2000 (per 10,000 inhab.)	90.7	43.3	41.3	44.0	58.2
Hospital beds, 2000 (per 1,000 inh.)	9.2	4.0	4.4	4.3	5.2
Net internal migration, 1997 (%)	+7.3	-3.1	-7.4	-11.4	

^a Estimated in Cuba following the methodology of the HDI.

Sources: Based on Informe 1997; CIEM 1997, 2000; and ONE 2001.

b Homogeneity of provinces based on multiple socioeconomic indicators: most homogeneous 1 and least 0.

^c Oriental provinces.

In addition, in 1997 Havana had the highest income per capita while the other three provinces had the lowest. In 2000, the three worst provinces had the lowest average enrollment rates in elementary school, as well as the highest infant mortality and under 5 mortality rates per 1,000 live births; Granma also had the highest mortality rate of the population age 65 and above and the highest open unemployment rate (14%), 2.5 times the national rate, while Guantanamo had the highest proportion of infants born under weight in the country (ONE 2001; MINSAP 2001; Mesa-Lago 2003). It is not surprising, therefore, that while Havana has the highest internal **im**migration (7.3%), Guantanamo and Granma have the highest emigration (7.4% and 11.4% respectively) (see Table 6).

E. Racial Disparities

The Revolution did not enact a specific law against racial discrimination but implemented the following policies geared to the poor, where blacks were over-represented and significantly improved their socioeconomic conditions: opening of recreational facilities to all the population (private beaches, clubs that excluded blacks), nationalization of private schools (where virtually no blacks were enrolled), reduction of illiteracy combined with significant expansion of free education at the secondary and higher levels (blacks had higher illiteracy rates and lower enrollments than whites), expansion of employment (blacks were more affected by unemployment than whites), and universalization of free health care (De la Fuente 2001).

In 1962 the government proclaimed that discrimination had disappeared with the eradication of "class privileges" and that the "racial problem" was solved. A taboo was imposed thereafter on public discussion on race, and the government took several negative measures, such as banning of Afro-Cuban religious sects allegedly for being socially dangerous and linked with a culture of criminality (they were reauthorized later but under tight restrictions), and closing of black societies and clubs. By the 1980s, despite remarkable improvements, the concentration of blacks in dilapidated housing in poor neighborhoods was unchanged for the reasons explained; blacks remained underrepresented in managerial positions but over-represented in menial jobs and in the prison population; there were few black actors and directors in television and cinema, and racial jokes reproduced past negative images of blacks. "The lack of a public debate about race and racism facilitated the survival and reproduction of the very racist stereotypes the revolutionary leadership claimed to oppose" (De la Fuente 2001: 295).

The severe crisis of the 1990s reversed some of the previous gains and created new inequalities: foreign remittances are crucial for survival but 84% of Cubans abroad are whites while 34% of those who live in the island are blacks, hence the latter receive less than one half per capita of what the former get; access of blacks to jobs in tourism is difficult due to domestic prejudices exacerbated in foreign companies; concentration of blacks in poor neighborhoods impede them to open *paladares* and relatively few blacks own private farms; the expansion of the private sector, where the government does not control employment, contributes to job discrimination by race, and black women made up a high percentage of prostitutes. There are a few signs of black discontent, for instance, most rioters in the summer of 1994 in Havana were Afro-Cubans, surveys show that

young blacks might resort to the organization of all-black societies to resist a setback in their rights, and a Fraternity of Blackness was created in 1999 to make the government fully aware of the growing inequalities (De la Fuente 2001).

F. Disparities Vis-à-vis Foreigners

Cuban citizens are discriminated in relation to foreigners in different ways. We have already discussed the excellent healthcare services available for foreigners in contrast with the severe deterioration in access and quality of healthcare for Cubans. Furthermore, Cubans are prohibited from entering or using hotels, restaurants and other services exclusively available for foreign tourists; Cuban-American visitors are not even allowed to pay a tourist room to a relative or friend; such discrimination has been labeled "tourist apartheid" by some observers. Last but not least, although the 1995 Cuban investment law allowed foreigners to own business in the island (as much as 100% of total shares), Cubans are prohibited from owning and operating even small family businesses (except for *paladares*). It is an irony that, technically, the 1995 law does not exclude Cuban-Americans who are U.S. citizens from owning businesses in the island (the U.S. law does), but deny that right to Cuban citizens. In 1995 a legal draft was circulating in the island, which would have granted that right but it was not approved and has not been mentioned in the last five years (Mesa-Lago 2000, 2003). Interestingly, the Proyecto Varela, based on the political constitution and signed by more than 10,000 Cubans, requests the holding of a referendum on several crucial human rights and civic freedoms, including the following: "That necessary changes be made in the law to guarantee citizens the right to organize and operate private businesses, for individuals as well as cooperatives, to carry out economic activities either in production or services" (Proyecto Varela 2002).

G. Differences in Satisfaction of Basic Needs

The impact of the reforms on the satisfaction of basic needs differs among various groups of the population. Those who earn dollars or receive bonuses in convertible pesos or dollars or remittances from abroad and have substantial bank savings, more than cover basic needs, but those who only earn a regular salary or a pension in pesos and lack bank savings cannot satisfy even basic food needs (Those who have savings have withdrawn money from their bank accounts to survive but we have seen in Table 2 that deposits of 87% of savers have declined, while deposits of 3% of savers have increased significantly). Four factors have contributed to the deterioration of the situation since 1993: (1) the decrease in 44% in the average real wage and, hence, in its purchasing power; (2) the reduction in the rationing quotas (goods subsidized at a price below production cost) that now only cover about 10 days in the month, thus forcing to buy the needed essential foodstuffs for the remaining 20 days in the other markets; (3) the excessively high prices in dollar shops (TRD) for essential consumer goods in high demand because of the sales tax of 140% plus huge profits; and (4) the high prices still charged in the agricultural free markets, in spite of the declining trend of such prices in 1995-2001, because of three reasons: the very low acopio prices paid to private farmers and members of UBPC that are disincentives to increase their output, the little supply by UBPCs and the state farms to those markets, and the agreement on prices among sellers before the market opens, which leads to profits of 20% and no stimuli to raise production (Togores 1999; Pérez Villanueva 2002).

Table 7
Prices in Pesos Under Rationing and in Non-Rationed Markets:
December 2001-February 2002

Goods	Rationed	Non-Rationed ^a	Difference (%)
Milk (litter)	0.25	3.57	14.3
Bread (small roll)	0.05	0.66	13.2
Eggs (one)	0.15	3.00	20.0
Rice (1 pound)	0.24	4.26	17.8
Beans (1 pound)	0.30	7.09	23.6
Oil (1 litter)	0.40	19.45	48.6
Lard (1 pound)	0.30	22.60	75.3
Pork (1 pound)	6.00	28.00	4.7
Lamb (1 pound)	4.50	20.00	4.4
Fish (1 pound, low quality)	0.50	9.20	18.4
Sugar (1 pound, refined)	0.14	2.44	17.4
Salt (1 pound)	0.10	2.00	20.0
Potatoes (1 pound)	0.30		
Taro (<i>Malanga</i> , 1 pound)	b	2.00	
Plantain (one)		1.00	
Pumpkin (one, middle size)		7.00	
Guava (1 pound)		2.50	
Soap (one, bathing)	0.25	7.30	29.2
Chinese TV		4,000.00	

^a Includes goods sold in government stores, free agricultural markets and state agricultural markets.

Sources: Mainly Pérez Villanueva 2002; also Espinosa 2001a, 2002, and interviews in Miami with Cuban visitors and immigrants.

The prices of rationed goods and those non-rationed sold either by state stores or free agricultural markets at the end of 2001 and early 2002 are compared in Table 7. The difference between the two sets of prices ranges from 4 to 49 times. Until the end of the 1980s rationed goods barely covered the essential minimum for one month and the population had to make long queues, because rationing quotas were not guaranteed as goods were sold on a first come first served basis. In 1992-2002, quotas of rationed goods shrank, the queues worsened and many goods that were sold freely became rationed. For instance, bread was sold freely and now only a small roll per person is sold daily at 0.05 pesos, if more is needed the price goes up 13 times; fish was also abundant but now a

^b Available only for children.

⁸ A comparison made in 1995-2001, between rationed and non rationed prices of 14 goods, showed that the total cost of the former was 9 pesos and that of the latter 109 pesos, for a 12 to one ratio; virtually all market prices declined until 2000 but six of them increased in 2001 (Pérez Villanueva 2002).

quota of half a pound per person is sold at 0.50 pesos or 18 times higher if bought in the non-rationed market; there were plenty of eggs also until 1993-1994 when they became rationed, in December 2001 one egg cost 1.74 pesos and in February 2002 the price jumped to 3 pesos if they could be found. Furthermore, many goods are only available in the dollar shops (TRD), affordable only if one earns or receives foreign currency from abroad (TRD prices are as much as 100 times higher than rationed prices). The average monthly salary of 241 pesos at the end of 2001 (equivalent to \$9.63 at the CADECA exchange rate) could be spent buying one bar of soap (\$1.00), half a litter of oil (\$2.40) and a pound of taro or *malanga* (\$6.00). At the beginning of 2002, Chinese TV "Pandas" were sold for 4,000 pesos each in the state non-rationed market, equivalent to 1.5 times the average annual salary of a state worker; some sets were sold in the TRD at \$470 (equivalent to 12,000 pesos); the price in China was \$100, hence, Cuba made profits of 50% or 370% depending on which market the TV set was sold (Maseda 2002).

According to Cuban economist Togores "income is insufficient to meet basic needs of a typical family of four persons, and some groups of the population are very badly affected; this refers to minimum needs in food and hygiene and excludes expenses such as house rent, electricity, clothing, transportation and other essentials ... there has been a deterioration of the caloric intake of the population as well as in the proportions of its nutritional composition ... Statistics reveal that the consumption of a set of important nutrients required as a minimum diet for a healthy functioning of the body are well below the needed levels" (Togores 1999: 13). Daily consumption of calories per capita decreased from 2,955 in 1984 to 1,863 in 1993 and rose to 1,993 in 1995, still 32% below the 1984 level and 10% below the minimum required (Sixto 2002; Togores 1999). For 1995 Togores found serious deficiencies in fats and acid fats, vitamin B and niacin (available in fruits and meats, important for the neurological system), vitamin B12 (important in the generation of red cells) and vitamin A (important for growth, vision and the immunity system). The average cost of the food basket to fill the nutrient deficiencies in 1995 increased from 73 pesos to 189 pesos; the difference of 116 pesos (61.6% of the total needed) ought to be satisfied buying the goods in dollar shops, agricultural free markets or black markets, but the average income per capita was estimated as 113 pesos, a gap of 76 pesos. The situation in 2002 is considerably worse than in 1995.

H. Poverty and Social Welfare

The first report on poverty, published in Cuba en 1997, referred to "population in risk of not covering some essential need" rather than poverty incidence, arguing that Cuba was an unique case because its government guaranteed a monthly supply of a minimum level of basic foodstuffs at subsidized prices, provided free health care and education, as well as social security or social assistance protection, and most of its population either owned a home or paid low or no rent. The *urban* population in risk was that with insufficient income to buy a basic basket of foodstuffs, which determined the poverty line. An estimated value of all the cited social services was added to the average income of the population, while the value of the food basket was calculated taking into account the subsidized prices of food bought through rationing (it was said that the latter supplied 73% of total available food in the island and the remaining 30% was obtained in

free agricultural and similar markets as well as self supply). The study did not show the full calculations and even the scattered data provided was confusing and contradictory: the average monthly *income* of the urban population was not given but the transfer of the value of social services was estimated "between 110 and 160 pesos ... the equivalent of 40% of the average income"; as two considerably different values for the transfer were given, the average income can be calculated from 275 to 400 pesos, quite high because the average state salary was only 220; total income, therefore, was from 375 to 560 pesos, an obvious overestimation. The value of the food basket was calculated as 74 pesos, which was underestimated. Based on this flawed information the urban population on risk was calculated as 14.7%, with some of the following characteristics: children below age 14, those living in households with more than six members, more predominant among women than among men, those with primary education only, and those either unemployed or not economically active. A comparison of the population at risk in the city of Havana, in 1988 and 1995, showed a deterioration from 4.3% to 20.1%, because of expanding inequalities, and yet a similar comparison between 1995 and 1996 indicated an improvement from 20.1% to 11.5% due to a "reduction in inequality," which is contradicted by the data analyzed in section II-A of this paper (Informe de Cuba 1997).

The unreliable 1997 study, discussed above, has been followed by a much more sophisticated and recent one authored by Togores. Utilizing the average cost of the food basket, the gap between that cost and the average income per capita and a distribution of the population by income groups, she estimated the Amartya Sen Index of severity of poverty in Cuba for 1995. The Index combines two variables: poverty incidence or the percentage of the total population under the poverty line (based on a basket of essential foodstuffs), and the Gini coefficient of the distribution of average income among the poor. 10 Cuba's poverty incidence in 1995, based on two different variants, was estimated as 61% or 67% of the total population, and the severity of poverty as 39.7% or 41.8%. Togores argued (in the same vein as the 1997 study) that the Sen Index determined poverty based on the insufficient income to acquire the food basket, but excluded state transfers of free social services to the population such as education, health care, social security and social assistance (housing was not included by her). If these services were taken into account, therefore, both income inequalities and poverty incidence would be reduced. She acknowledged that increasing prices had an adverse effect on the population but that the transfer of free social services partly compensated for those losses (she did not refer to state subsidies to consumer goods). Finally she alleged that expenditures in social services rose 26% during the crisis (1989-1998), for an annual average increase close to 3% (Togores 1999: 16-18). The problem with this final argument, however, is that she took the value of social services in current prices instead of adjusting them with her own consumer price index (CPI).

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⁹ The first version of this study was elaborated by a team led by Angeles Ferriol, Director of Social Studies at the Instituto de Investigaciones Económicas of the Ministry of Economics and Planning, and released in June 1997. The final version analyzed in this study was published in October without any authorship.

¹⁰ The equation is: SI = H [I + (1 - I) G], where H is in the poverty incidence (poor population/total population), I is the percentage gap between the average income of the poor and the poverty line Z (determined by the value of a basket of essential goods) and G is the Gini coefficient of the distribution of average income among the poor population.

Table 8 demonstrates that real expenditures per capita declined 78% in 1989-1993 (worst point of the crisis) and, although they increased in 1994-1998, in the last year they still were 40% below the 1989 level. Not only real income per capita plummeted about 45% in 1989-1998 (see section II-A-1), but real social expenditures shrank 40% in the same period. This paper has also demonstrated that the quality of social services has also severely deteriorated since the early 1990s (see section II-C). All this means that the missing factor (free social services) in estimating both poverty incidence and the severity of poverty did not play a significant compensatory role in both measures and that these should be close to reality. Furthermore, the expansion of income inequalities in the 1990s and early 2000s (see section II-A) have aggravated the gap between the poor and the still small but increasing segment of the population which is wealthier. The reappearance of mendacity in Cuban streets since the mid 1990s and the government struggle against beggars who ask money and goods from tourists, particularly in Havana, is not only an additional indicator of poverty but of income inequality as well. Last but not least, the supply of basic consumer goods though rationing declined from one month in 1989 to ten days per month in the 1990s, therefore, this potential compensatory factor alleged by the 1997 study shrank two-thirds. In conclusion, the poverty incidence of 61% to 67% or the severity of poverty index of 40% to 42% estimated by Togores for 1995 are much closer to reality than the 14.7% calculated by the 1997 study for 1996.

Table 8
Nominal and Real Social Expenditures: 1989-1998
(in million pesos)

Expenditures	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998
Nominal										
Education	1,650	1,620	1,504	1,427	1,385	1,335	1,359	1,421	1,454	1,510
Healthcare	904	937	925	938	1,077	1,061	1,108	1,190	1,265	1,345
Social security	1,094	1,164	1,226	1,348	1,454	1,532	1,594	1,630	1,636	1,705
Housing ^a	406	383	281	248	260	315	411	462	488	566
Social welfare	101	96	88	96	94	94	119	128	135	145
Total	4,156	4,200	4,024	4,059	4,268	4,337	4,591	4,831	4,978	5,271
CPI	1.443	1.509	1.830	3.515	6.578	5.575	2.940	2.883	2.904	2.903
Real total	2,880	2,784	2,199	1,288	648	778	1,561	1,676	1,714	1,815
Per capita ^b	272	260	204	106	59	71	142	152	154	163
Index ^c	100.0	95.9	75.0	39.1	21.8	26.1	52.2	55.9	56.9	60.0

^a Togores excluded housing from social services, but I decided to include it.

Source: Author's calculations based on: nominal expenditures from ONE 1998, 2000; CPI from Togores; and population (to estimate per capita) from ONE 2001.

It should be also noted that gratuitous social services provided by the state, as well as subsidies to rationed goods and transportation are not targeted on the poor but received by all the population, including workers who earn very high income in the private sector or receive bonuses and awards in kind provided either in the state sector

^b In pesos.

c 1989 = 100.

or in mixed enterprises, and/or get foreign remittances (Ferriol 2001). In view of the increasing inequalities and poverty in Cuba, this policy is not only a waste of scarce resources but an obstacle to provide more help for those desperately in need. Table 8 shows that the nominal amount spent by the government on social welfare, for those who are in severe need, averaged 2.4% of total social expenditures in 1989-1998, by far the lowest share among all social services. Furthermore, real social welfare expenditures shrank 29% from 70 million pesos in 1989 to 50 million pesos in 1998, in spite of increasing poverty. The monthly amount paid for welfare in early 2002 was 40 pesos, grossly insufficient to buy one extra week of food in non-rationed markets (see Table 7); at the CADECA exchange rate it was \$1.60, one-fourth of the cost of one pound of *malanga* in the dollar shops.

III. RECOMMENDATIONS FOR CHANGE

A. Reforms Within the Current Regime and in a Future Transition

Whether we agree or not with their views, many Cubans believe that socioeconomic equity was one of the most important accomplishments of the Revolution. The current crisis of legitimacy of the regime is partly the result of the violation of that principle, which has led to the significant inequalities analyzed in the first part of this paper. In order to design policies to correct or at least ameliorate current socioeconomic disparities in Cuba, it is essential to distinguish two different scenarios: (1) in the medium term, the continuation of the current regime albeit with a resumption of the market-oriented reform, and (2) in the long term, the potential collapse of the regime and a farther transition to the market. In both scenarios, therefore, we assume that there is a move to the market but significantly smaller in first than in the second. If the first scenario does not materialize, socioeconomic disparities shall continue to increase, hence aggravating the current situation.

As it was mentioned in the Introduction of this paper, the economic reforms that began in 1993 induced a halting in the dramatic GDP decline and a mild recovery since 1995. In spite of these positive economic results, in mid 1996 the move to the market was halted and, since then, only marginal changes have been undertaken; furthermore, some reform policies have been reversed. The following measures that were planned in 1995-1996 had not been implemented by May of 2002: the establishment of a true convertible peso, the dismissal of 500,000 to 800,000 unneeded workers in the state sector, a general price reform, the reintroduction of workers' contributions to social security, the approval of self-employment in university-graduated type of occupations, the authorization for Cubans to own and operate their own businesses and so forth. The reason for the halting and even reversal in some reform policies is the leaders' fear that a continuous move to the market would demand delegation of economic power and weaken even more the feeble regime. The political logic, therefore, has taken precedence over the economic logic and people's welfare. And yet, several Cuban reformist scholars and technocrats agree that, without a return to the reform path, the island economy will not be able to sustain its recovery, which slowed down in 2001 (in that year GDP per capita was still 23% below the 1989 level). The tragic events of September 11, 2001, combined with the world recession and decrease in world travel have provoked a decline in nickel and sugar prices, international tourism and foreign remittances, all of them crucial for the Cuban economy, and raised the spectrum of another severe crisis (Mesa-Lago 2001, 2002). As in 1993, such predicament might force the leadership to resume its move towards the market and, under such scenario, certain changes can be recommended to ameliorate some socioeconomic disparities.

In the long run the regime should be transformed, hopefully in a peaceful manner and toward a pluralistic democracy, and the scenario of a stronger move to the market could then materialize and allow more profound policies to cope with socioeconomic disparities. The experience of Eastern European countries suggests that unless proper policies are not implemented, inequalities should increase during that type of transition. It is important, therefore, that an adequate set of policies is designed for the second scenario (for a previous approach to the "second transition" see Mesa-Lago 1993).

B. Overall Macroeconomic Reforms

It is impossible to cope with the current socioeconomic disparities in Cuba without implementing overall macroeconomic reforms that are needed to increase GDP, output of goods, employment, real wages, government revenue and satisfaction of basic needs, as well as to reduce poverty and improve the quality of social services. Although this crucial issue goes beyond the scope of this paper, general guidelines are offered below.

Under the first scenario, the reforms would be limited for the reasons discussed in the previous section, but Cuba could follow the path of China and Viet Nam and move towards a socialist market economy with the following changes: (1) expansion of productive and service activities in the private, cooperative and mixed sectors, and introduction of competition within the state sector; (2) transforming UBPCs into truly autonomous cooperatives (able to decide freely what to produce, to whom sell their produce and set prices) and thus with more economic incentives to increase production and delivery of goods to free agricultural markets; (3) granting of more land parcels to individuals and families to increase both self-consumption and delivery of produce to free agricultural markets; (4) increase in food production and competition, thus pushing prices down and helping to raise consumption and meet basic food needs, through measures 2 and 3; (5) authorization to Cuban citizens and groups of workers to manage small and medium businesses, elimination of current restrictions imposed on self-employment work and permission to university graduates to practice their professions as self-employed, hence, creating enough jobs in the non-state sector to permit the dismissal of non-needed workers in the state sector, as well as expanding the supply of goods and services; (5) allowing foreign enterprises and joint ventures to hire, promote and pay their employees directly, both salaries and other economic incentives, all of whom should be declared for tax purposes; and (6) completion of the banking reform, implement a comprehensive price reform and establishment of a truly convertible peso tradable in international markets to gradually eliminate the current dual monetary system.

Under the second scenario Cuba would move much faster and deeper into a market economy and more radical changes in property and market relations introduced, including selective privatization of state enterprises, setting most prices by supply and demand, more flexible rules for foreign investment, free practice of all professions and occupations, monetary and banking reforms, convertibility of the peso and unification of the exchange rate, free entry of foreign remittances at the unified exchange rate, introduction of capital markets, and so forth. Under this scenario Cuba would be able to reinsert in international financial organizations and receive economic and technical aid (see section III-G). This transition should be gradual and combined with a social safety net, instead of based on the shock therapy approach; within Latin America Costa Rica provides a successful example of the gradualist approach (Mesa-Lago 2000; see also the numerous articles on this issue published in *Cuba in Transition*, volumes 1 to 11).

Regardless of the scenario considered, there is a serious and urgent need to fill the enormous vacuum of data on socioeconomic disparities in Cuba by collecting and analyzing statistics on that subject. They will be needed to identify the most vulnerable population, design adequate corrective policies and estimate their costs. In addition, there must be a public informed discussion on such disparities and ways to cope with them; people's participation in this process is important as a move towards democracy and in forging consensus.

C. Overhaul of the Tax System

In any of the two scenarios, proper economic incentives are essential to promote growth and development, which means that some level of income and wealth inequalities should be maintained. To reject the latter would be equivalent to the nefarious egalitarianism practiced in past stages of Cuban socialism but, to ignore or allow said inequalities without taking any corrective policies, would be tantamount to preserve the current situation in Cuba, which could worsen under the transition (second scenario). The question is how to reach an optimal level between the needed economic inequalities and the adverse social effects they cause. This problem would be aggravated in the transition, as it happened in almost all Eastern European countries, which experienced a rapid decline in tax revenue because of losses from state enterprise profits and turnover tax revenue and lack of institutional capacity to collect taxes in the new market economy (Gallagher 1999). The proper approach would be to completely reform the tax system in order to provide the needed resources to undertake the market reforms, including the implementation of a social safety net and other social changes. The first policy is discussed in this section and the second set of policies in sections III-D through G.

1. Making the Tax System More Progressive

The tax law of 1994 did not include a general income tax although stipulated other progressive taxes such as those on inheritance and hard-currency income from abroad. Because of the enormous restrictions on wealth accumulation in Cuba, nevertheless, inheritance of a sizable amount is virtually impossible in Cuba today and so

is tax revenue from that source (the same is true for real estate taxes). Hard-currency income earned abroad is mainly coming from famous artists and musicians and is not a very significant source of fiscal revenue either (professionals working abroad pay as much as 50% on income of \$60,000 and above in order to retain the right to return to Cuba, which is very high). On the other hand, there have been several taxes and measures implemented on self-employment, owners of *paladares* and house rentals for tourists that, rather than promote those positive activities and hence their tax revenue, have actually contributed to their reduction. All these activities and others not authorized today (such as self-employment by university graduates and ownership of small and medium businesses by Cuban citizens—ownership of large enterprises in the second scenario) should be promoted instead of discouraged but their income taxed properly. And yet, only 3% of tax revenue is currently generated by direct "personal" income.

Indirect taxes contribute 56% of tax revenue and we have already discussed their general regressive impact on distribution. Taxes on alcohol and tobacco, however, generate 20% of fiscal revenue and they should be kept because of their additional positive health effects. Sales taxes contribute another 30% of fiscal revenue and are a heavy burden on the lowest income groups of the population while not correcting income inequalities. The value-added tax (VAT) has not been a major fiscal revenue generator during the early years of the transition, as it has developed slowly, but could become a significant source after economic reforms are successfully implemented. Current sale taxes should be limited to the minimum necessary and substituted by a combination of a progressive personal income tax and a corporate tax. All residents as well as Cubans who earn income abroad must pay income tax, it should have few rates and exemptions (those below a minimum income), and it should be withheld on salaries, interest and dividends (the latter should be deductible from the income tax to avoid double taxation). The 1994 law also includes a tax on natural resource extraction, such as mining, forests and fishing but apparently it generates little revenue, and yet the development of the nickel industry should be an important generator of that tax revenue. Other taxes to be considered are import duties, excise on hydrocarbons, and taxes on tourism either special or as part of the VAT. Technical aid will be needed to develop the institutional capacity of the government to collect taxes (Gallagher 1999).

2. Taxing Savings and Remittances

In 1995, three Cuban economists, who ironically were purged for their advanced reformist ideas, recommended as a measure to avoid excessive concentration of savings in banking accounts, a change in currency that in practice would result in confiscation of savings above a given level (Carranza, Gutiérrez and Monreal 1995). The income tax explained above should handle savings properly by taxing interest income. Capturing income from remittances, however, would be a problem because of the informal nature of the reception of most remittances. Currently part of that income is taxed in the state dollar shops but at a very high rate; in the second scenario, as more consumer goods are available and private shops established, the sale tax rate should be reduced because the increase in sales volume would compensate for that cut.

D. Changes in Social Services

Perhaps the most important accomplishment of the Revolution and one generally praised both domestically and by foreign experts is universal free access to health care, education and social security pensions. But we have analyzed the severe problems that those services currently face, such as deterioration of healthcare and education, reduction in pension coverage and the real value of pensions, and escalating costs and state subsidies. Moreover, there has been a steady increase in the housing deficit throughout the Revolution. Last but not least we have discussed the increasing disparities in social services. This section suggests policies to cope with these problems.

1. Healthcare

The national health system (NHS) should be preserved but with some changes in order to make it financially solvent, improve the quality of its services, increase its efficiency, allow the participation of private activities and eliminate current disparities (for various approaches see Alonso, Lago and Donate Armada 1994; Mesa-Lago 2003).

Currently all healthcare services are free for all the population regardless of their income, which increases costs and reduces the quality of the services provided, thus making the NHS financially untenable. To make the NHS financially solvent, improve its efficiency and the quality of its services it is essential to take user's income into account for the provision of health services, particularly curative care. The following measures are recommended to reduce expenditure of the NHS and they are feasible under both scenarios: (a) place more emphasis on prevention, particularly on the infrastructure of potable water and sanitation, instead of the more expensive curative medicine; (b) cut the overhead of the Ministry of Public Health, which is from two to three times the international average; (c) halt investment in new physical plant because of the current low occupancy rate and high number of days of stay, and give priority to maintenance of buildings and equipment (also buy the most needed equipment); (d) convert unneeded hospitals (particularly gynecology and pediatrics, the most underutilized) into asylums for old people in need; (e) shift scarce resources invested in reducing the already low infant mortality rate (also the extremely expensive and relatively unnessary family doctor program) to other areas in need such as basic infrastructure, prevention and care of contagious diseases with high morbidity rates, and import of essential medicines and prophylactics; (f) establish entry quotas in schools of medicine for the training of new physicians until the current glut subsides, encourage the enrollment of nurses and other paramedic personnel, and reduce the number of physicians in the state sector facilitating their private practice (see below); (g) terminate the free overseas medical assistance program and fellowships for foreign students, as Cuba lacks resources for these expensive programs and these resources must be spent at home; and (h) maintain the pharmaceutical and biotechnological industries but in an efficient manner and on a competitive basis in order to make them profitable.

The following changes are needed to increase income: (a) introduce user fees and co-payment for hospitals and laboratories (not in prevention and primary care) according to the users' income, exempting the lowest income groups; (b) charge the full cost of extra hotel services to high income groups who want better quality of service and can afford it (these two measures would be very difficult to accept under the first scenario); (c) maintain and enlarge contracts of medical personnel abroad and collect income tax on their income; and (d) attract Cubans living abroad, particularly those retired, to receive healthcare in the island paying for their services and negotiating the transfer of insurance cost with foreign governments (more likely in the second scenario).

The promotion of the private healthcare sector not only would reduce costs in the state sector, but would also create competition and allow high-income groups to get more personalized attention, paying for those services. The national health system then, would be targeted on low-income groups and improve the quality of their care. To achieve those goals the following steps should be taken: (a) authorize the private practice of physicians, dentists and other healthcare personnel as self-employed or organized in cooperatives (first scenario) and in private clinics and hospitals (second scenario), their income subjected to the general income tax; (b) encourage large enterprises to provide primary healthcare to their employees by deducting those expenses from their corporate taxes (both scenarios); and (c) allow the private sector to provide paid services to foreigners in competition with the state sector (unfeasible under the first scenario).

To cope with current disparities in healthcare, the parallel, privileged and costly scheme of the armed forces, internal security and top leaders should be integrated with the NHS, an action that would reduce costs and promote equality in treatment. Members of these three groups who have high income and want to have more personalized care and hotel facilities should pay for them either in the NHS or the new private sector. This measure, however, will be politically difficult to implement, albeit more under the first scenario than under the second, and yet if the armed forces play a key role in the transition, they would strongly oppose such integration. Persistent inequalities in healthcare among the Cuban provinces (particularly those who are in the worst situation, such as Las Tunas, Granma and Guantanamo) should be the subject of targeting policies, establishing priorities in the allocation of resources, initially for the first and second level of care and, later on, when more resources are available, for the third level as well.

2. Education

A strong public educational system should be continued, although with similar policies explained in the previous section to make it financially solvent and improve its efficiency and quality of services. Cuba still have plenty of teachers and the decline in population growth and the aging process demand less resources for elementary school, but it is important to reestablish economic incentives (adequate wages) to cope with future demands at this level and for secondary education. An adjustment of education (particularly at the secondary and high level) to the requirements of a competitive world market is needed (including some shifts from formal toward vocational education) and resources should be reassigned accordingly. Internal efficiency must be improved,

reducing the rates of desertion and repetition and establishing rigorous quality standards for the evaluation of educational attainments. Proper incentives should be introduced to train at the university level the technicians, agronomists, business administrators, bankers, and other professionals needed for development. As in the case of all higher-education graduates, teachers should be allowed to practice their profession either as self-employed or in their own schools. The participation of private activities in education, under general rules set by the state, should be allowed and cost recovery in higher education introduced for those who have high income (this would be rejected under the first scenario). Targeting of educational resources on the most vulnerable population, the poorest provinces and the most needed jobs is essential (Castañeda and Montalván 1997).

3. Social Security Pensions

The unified and fairly universal pension system is an important accomplishment that should be kept, but it has been besieged by a sharp decrease in real pensions, virtual disappearance of the supplementary safety net, declining coverage of the population as the non-state sector expands, and intolerable costs that require increasing state subsidies, aggravated by the rapid aging of the population (for divergent approaches see Alonso, Lago and Donate Armada 1993; Peñate and Gutiérrez 2000; Mesa-Lago 2003).

To cope with these problems it is essential first to reduce costs and increase income, in order to balance the system and have resources to raise the level of pensions. On the expenditure side the most important measure to be taken, regardless of the scenario, is the gradual raise in the age of retirement from 55 for females and 60 for males to 65 years for both sexes, in a period of ten years for females and five years for males; if this step were politically unfeasible, then ages should be risen to 60/65 in a period of five years. This action would substantially reduce the costs of the system but would be insufficient to cover expenses particularly in the long run, with the aging process. There is urgent need, therefore, to implement the clause of the tax reform law of 1994 that stipulated the reintroduction of the worker's contribution but was suspended for political and socioeconomic reasons. Such contribution would have to be from 3% to 8% of salaries (based on two different estimates) and keep increasing through time. An alternative is to close the current pension system, made the state responsible for ongoing pensions and create a new mandatory system with younger insured and lower costs, at least for a fairly long period of time; the new system would be financed by employers and workers contributions, as well as a reserve fund that would be invested and its vield used to help finance future benefits. A supplementary voluntary pension program financed with workers contributions could be available for high-income groups. The very low level of pensions could be gradually increased by a combination of the above measures and a potential economic expansion, provided that measures recommended in this paper are implemented. The expanding non-state sector, both formal and informal (selfemployed, owners of *paladares* and small businesses, private farmers, and their potential salaried employees) should be mandatorily covered by the new system, with special conditions and benefits to incorporate the informal ones (Mesa-Lago 2003).

The separate privileged schemes of the armed forces and internal security have costs equal to the deficit of the general system and create unjustifiable inequalities, as their conditions of entitlement and benefits are better than those in the general system. These schemes should be integrated with the general system and, if this is not politically feasible, their member must pay the proper contributions to support their privileges.

4. Housing

In 2000 the housing deficit in Cuba was close to half of the existing stock, and half of the latter was not in good shape, which makes this problem one of the worst in the island. Furthermore, the very low rate of housing construction under the Revolution combined with the destruction of part of the previous stock due to lack of maintenance, have preserved pre-revolutionary disparities in housing, particularly among blacks. Disparities among provinces and within Havana neighborhoods, in terms of the quality of housing, are significant also. In per capita current pesos, the 2001 budget allocated 12 times to education and 10 times to healthcare the amount allocated to housing (MINFP 2001). The government incapacity to ameliorate, less solve this problem has been compounded by its excessive regulations and restrictions on housing construction, repair, trading and leasing.

According to the 1970 census, 86% of families in Cuba either owned their home or were paying monthly installments to buy one (in the form of rent to the government), while 8% paid rent for public housing (fixed as 6% of the monthly household income) and 6% were exempted for paying any rent because their monthly income was below 25 pesos. The 1981 census did not provide data on this distribution. A housing law passed in 1984 allowed tenants to convert leases with the state into purchasing contracts with monthly installments equal to the rent they paid and, in 1988, from 200,000 to 500,000 had been signed (Mesa-Lago 1993). No further data are available on such distribution but the combination of all the information available indicates that in 2002 the overwhelming majority of the Cuban population owned its home, but it endured significant overcrowding, deterioration and even risk of collapse.

It is obvious that the state will be incapable of solving the existing housing problems, therefore, more freedom has to be granted to the population to repair their own homes, as well as trade (swap) or rent them or built new ones. The degree of such freedom under the first scenario would be considerable less than under the second scenario. In any case the poorest segment of the population who currently occupy a public dwelling without paying anything should be either allowed to continue with that arrangement or paid a means-tested housing allowance to replace rental exemption. The amount allocated for housing must be increased but its allocation and use changed. Part of the resources available for direct housing construction by the government should be targeted to help the households in most need (the poor, blacks, least developed provinces); preferably, aid recipients should repair their dwellings by themselves under minimal building norms. Another part of those resources should be allocated for small loans for repair and building of modest dwellings. The *Banco de Ahorro Popular* provides personal loans to buy new housing units, as well as for self-construction and

maintenance but no data are available on those loans and their amounts; furthermore, the Bank does not provide credit to buy existing houses or land to build new ones or for trading homes. It would be better to create a bank specialized on housing that could provide loans for all those purposes (Dammert 1997).

E. Coping With Remaining Racial Disparities

In spite of significant advances of blacks in Cuba (in education, healthcare, employment and equal access to recreational facilities), important disparities remain (e.g., concentration in poor housing, under-representation in top managerial and political positions, over-representation in prisons); the crisis of the 1990s and 2000s reversed some of the previous gains and created new inequalities (blacks are under-represented in reception of foreign remittances and in jobs in tourist facilities). The government claim that the racial problem has been solved and the proscription of public discussion on this issue have blocked the solution of such disparities.

It is crucial that a public discussion is opened on the remaining issues of racial discrimination in Cuba and the ways to solve them, at schools, jobs and through the news media. Blacks should be allowed to organize associations and movements to defend their rights and continue their advancement in the same manner they did in South Africa, the United States and other countries. Particular attention should be given to provide housing to blacks and to secure that they are treated equally in job hiring and promotion, especially in foreign enterprises. Current discrimination against all Cubans, including blacks, in terms of access to tourist facilities should be terminated in both scenarios.

F. Introduction of a Social Safety Net

In view of the increasing inequalities and poverty, the current policy of providing free social services, as well as subsidies to rationed goods to all the population, including those who have very high income and savings, receive awards in kind and/or get foreign remittances, is not only a waste of scarce resources but an obstacle to provide more help for those desperately in need. Real social welfare expenditures shrank 29% in 1989-1998 and the state budget share spent on social welfare in 2001 was only 2% of total expenditures or 0.7% of GDP. In the 2001 budget, the per capita in current pesos allocated to social welfare was 9% of that for education, 12% of those for healthcare and social security, and similar to those devoted to sports and to art (MINFP 2001).

We have already suggested policies to transform the free provision of social services in order to take income into account, and have shown that price subsidies to rationed goods have been cut by two-thirds and continue to decrease. Those considerable resources should be shifted and targeted to provide social assistance to the population under the poverty line, particularly the extreme poor whose income is insufficient to even satisfy food needs. The change from indiscriminate subsidies granted to social services and consumer goods, toward targeted aid to those in need would alleviate current inequalities, have a progressive impact on distribution and correct many of the current price distortions. It should be noted that Cuban reformist scholars and technicians

advocated such shift in policy in the early 1990s, hence, it should be feasible under the first scenario (Carranza, Gutiérrez and Monreal 1995). Under the second scenario, where market forces would operate much more freely, prices of consumer goods, services and housing would increase significantly and, hence, there should be even more need for a social safety net (SSN).

The SSN should provide temporary income supplements, preferably in the form of flat payments targeted to the poor (means-tested), guaranteeing a subsistence minimum (food, housing, energy); it should have a simple administration and be monitored carefully to ensure it is restricted to those in need. The cash payments would be supplemented with continuous free healthcare and education for the poor, as explained above. The SSN must be a key instrument in facilitating the other reforms suggested in this paper and ameliorating their potential harmful effects. It should be accompanied by a widespread, intelligent information campaign addressed to the population, explaining the human logic and priorities of that program and the rest of the reforms (Mesa-Lago 1993; Alonso, Lago and Donate-Armada 1994).

G. The Need of Foreign Aid

Most of the reforms recommended above would require substantial international aid and technical support but, although a member of the United Nations agencies, Cuba does not belong to international financial organizations (IFOs), such as the International Monetary Fund (IMF), the World Bank and the Inter-American Development Bank (IDB), as well as the institutions from the governments that are part of the Club of Paris. The Cuban government withdrew from the IMF and the World Bank in 1962, never signed the founding agreement of the IDB and is not a member, and the suspension of payments of its debt with the Club of Paris in 1986 has impeded to be beneficiary of their institutions. The possibility of becoming a member of the first three IFOs under the first scenario is slim because of the prominent role that the United States play in them and the stipulations of the Helms-Burton Act of 1996. The situation would be more propitious under the second scenario.

In any case Cuba would have to apply for membership in the IFOs and it would take time to be admitted and set the membership quotas. And yet, although Cuba has a significant foreign debt (\$11 billion in 2001) and it would have to be negotiated and restructured, it has the advantage of not having a debt with the IFOs, which means that a government committed to the reforms suggested in this paper, could receive aid in a shorter period than normal. Furthermore, Cuba could be admitted into the International Development Association and become a beneficiary of the Highly Indebted Poor Countries (HIPC) Program providing that it signs an agreement with its creditors to reduce the debt and introduce economic and social reforms (see the proposal of Castañeda and Montalván 1997). In view of the widespread poverty suffered by Cuba and the enormous difficulties it will face to reform its economy and launch a program of sustained development, the Club of Paris and other creditors should consider condoning part of the Cuban debt providing that the island agree on the needed reforms including those that will alleviate its significant socioeconomic disparities.

BIBLIOGRAPHY

- Alonso, José, Armando Lago and Ricardo Donate-Armada. 1994. "A First Approximation Design of the Social Safety Net for a Democratic Cuba" in *Cuba in Transition* 4 (Miami: ASCE):
- Banco Central de Cuba (BCC). 2001. *Informe Económico 2000* (La Habana).
- Bauza, Vanessa and Tim Collie. 2002. "Housing Crisis on Island Literally Killing Some Cubans," *Sun Sentinel*, January 18.
- Benítez Pérez, María Elena. 2001. "La Política Social y la Vejez en Cuba: Algunas Reflexiones" (México D.F.: CISS VI Conferencia de Actuarios y Financistas a Nivel Internacional, September 3-5), unpublished paper.
- Carranza, Julio, Luis Gutiérrez and Pedro Monreal. 1995. *Cuba la Reestructuración de la Economía: Una Propuesta para el Debate* (La Habana: Editorial de Ciencias Sociales).
- Castañeda, Rolando and George Plinio Montalván. 1997. "Cuba: Cooperación Internacional de Emergencia y para la Recuperación" in *Cuba in Transition*, 7 (Washington D.C.: ASCE): 269-294.
- Castro, Fidel. 1993a. "Discurso en la Clausura del 40 Aniversario del Asalto al Cuartel Moncada," *Granma*, July 28: 3-7.
- . 1993b. "Speech at the 5th UNEAC Congress," *Granma*, December 8: 3-4.
- Centro de Investigaciones de la Economía Mundial (CIEM). 1997. *Investigación Sobre Desarrollo Humano en Cuba 1996* (La Habana: PNUD).
- _____. 2000. Investigación Sobre Desarrollo Humano y Equidad en Cuba 1999 (La Habana: PNUD).
- Comisión Económica de América Latina y el Caribe (CEPAL). 2000a. *La Economía Cubana: Reformas Estructurales y Desempeño en los Noventa* (México D.F. Fondo de Cultura Económica, 2nd edition).
- ______. 2001a. Balance Preliminar de las Economías de América Latina y el Caribe 2001 (Santiago de Chile: December).
- _____. 2000b, 2001b. Cuba: Evolución Económica Durante 1999, 2000 (México D.F.).
- Comité Estatal de Estadísticas (CEE). 1991. *Anuario Estadístico de Cuba 1989* (La Habana).

- Dammert, Lucía. 1997. "Políticas de Vivienda en Cuba: Análisis y Perspectivas," University of Pittsburgh, unpublished paper.
- De la Fuente, Alejandro. 2001. *A Nation for All: Race, Inequality and Politics in Twentieth-Century Cuba* (Chapel Hill: The University of North Carolina Press).
- Espinosa Chepe, Oscar. 2001a. "Suben los Precios en los Mercados Agropecuarios Estatales en La Habana" (La Habana: Cubanet Independiente, December 19).
- _____. 2001b. "El Cuentapropista Continúa Reduciéndose" (La Habana: Cubanet Independiente, March 18).
- _____. 2002. "Huevos Sólo para Diplomáticos" (La Habana: Cubanet Independiente, February 26).
- Ferriol Muruaga, Angela. 2001. "Reforma Económica Cubana e Impactos Sociales," (Moscow: Congreso de Latinoamericanistas y Caribólogos, June 25-29), unpublished paper.
- Gallagher, Mark. 1999. "Some Ideas for Taxation During Cuba's Transition" in *Cuba in Transition* 9 (Washington D.C.: ASCE): 36-46.
- Informe de Cuba. 1997. "Proyecto: Efecto de Políticas Macroeconómicas y Sociales sobre Niveles de Pobreza" (La Habana: Segunda Versión, October), unpublished paper.
- León, Francisco. 2002. "Cuba, las Reformas Económicas en las Negociaciones Internacionales: La Coyuntura Actual" (Madrid: Conferencia sobre Globalización y la Economía de Cuba, April 4-5), unpublished paper.
- Maseda, Héctor. 2002. "El Ministerio de los Televisores Panda" (La Habana: Cubanet Independiente, February 25).
- Mesa-Lago, Carmelo. 1993. "The Social Safety Net in the Two Cuban Transitions," in *Transition in Cuba: New Challenges for US Policy* (Miami: FIU, Cuban Research Institute), unpublished document.
- _____. 1998. "Assessing Economic and Social Performance in the Cuban Transition of the 1990s," *World Development* 26:5 (May): 857-876.
- ______. 2000. Market, Socialist and Mixed Economies: Compartive Policy and Performance—Chile, Cuba and Costa Rica (Baltimore: Johns Hopkins University Press).
- _____. 2001. "The Cuban Economy in 1999-2001," in *Cuba in Transition*, 11 (Washington D.C.: ASCE):

- _____. 2002. "Cuba at the Start of the 21st Century," forthcoming.
- _____. 2003. "La Seguridad Social en Cuba en el Período Especial: Diagnóstico y Sugerencias de Políticas en Pensiones, Salud y Empleo," forthcoming.
- Ministerio de Economía y Planificación (MINEP). 2000. *Plan Económico y Social 2001* (La Habana).
- Ministerio de Finanzas y Precios (MINFP). *Presupuesto del Estado Proyecto 2002* (La Habana)
- Ministerio de Salud Pública (MINSAP). 2001. *Anuario Estadístico 2000*. (La Habana: Dirección Nacional de Estadística).
- Monreal, Pedro. 1999. "Las Remesas Familiares en la Economía Cubana," *Encuentro* (Otoño): 49-62.
- Oficina Nacional de Estadísticas (ONE). 1998, 1999, 2000, 2001. *Anuario Estadístico de Cuba 1996, 1997, 1999, 2000* (La Habana).
- Peñate, Orlando and Luis Gutiérrez. 2000. La Reforma de los Sistemas de Pensiones en América Latina: La Alternativa Cubana (La Habana: Editorial de Ciencias Sociales).
- Pérez Villanueva, Omar Everleny. 2001. "Ciudad de La Habana, Desempeño Económico y Situación Social," in *La Economía Cubana en el 2000: Desempeño Macroeconómico y Transformación Empresarial* (La Habana: Universidad de La Habana CEEC and Fundación Friedrich Ebert, April):35-58.
- ______. 2002. "La Evolución de la Economía Cubana en los 90s: Una Valoración" (Madrid: Conferencia sobre Globalización y la Economía de Cuba, April 4-5), unpublished paper.
- Proyecto Varela. 2002. La Habana.
- Ritter, Archibald R.M. 2002. "Cuba: 'Dollarization' and 'De-Dollarization'" (Madrid: Conferencia sobre Globalización y la Economía de Cuba, April 4-5), unpublished paper.
- Rodríguez, José Luis. 2000. Report on the Cuban Economy, *Granma*, December 5: 1,5.
- Sixto, Felipe. 2002. "An Evaluation of Four Decades of Cuban Healthcare" (Miami: FIU, CRI 4th Conference on Cuban and Cuban-American Studies, March 6-9), unpublished paper.

- Togores González, Viviana. 1999. "Cuba: Efectos Sociales de la Crisis y el Ajuste Económico en los 90s," *Balance de la Economía Cubana a Finales de de los 90s* (La Habana: Universidad de La Habana CEEC, March): 82-112.
- Triana Cordoví, Juan. 2000. "La Economía Cubana en 1999," in *La Economía Cubana: Coyuntura, Reflexiones y Oportunidades* (La Habana: Centro de Estudios de la Economía Cubana y Fundación Friedrich Ebert): 1-16.
- Trumbull, Charles. 2000. "Economic Reforms and Social Contradictions in Cuba," in *Cuba in Transition*, 10 (Washington D.C.: ASCE): 305-320.
- UNESCO. 2001. http://unescotat.unesco.org/en/stas/stats).htm.