

INTERGENERATIONAL TRANSFERS AND SOCIAL PROTECTION IN LATIN AMERICA

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This paper examines the available evidence on intergenerational transfers in Latin America, their social and economic importance in different national contexts, their effects on distributional outcomes and on the medium and long-term financial sustainability of social protection systems. In this review, it used as a guide the concept employed by Lee (2003) and Mason and others (2005), according to which intergenerational transfers refer to the reallocation of economic resources among members of different ages, without an explicit *quid pro quo*. These transfers differ from other inter-temporal or intergenerational reallocations, such as investment in assets and credit operations in that the latter involve changes in the capital stock of the economy, transactions of land and property, or borrowing and lending, which are in any case governed by explicit or contractual obligations.¹

Intergenerational transfers are important because in all types of societies they help to smooth out consumption over the life cycle and, in particular, to cover income deficits during the “dependent” ages of childhood and old age. In Latin America, they are of special relevance because transfers, both intra and intergenerational, are also key to providing basic social protection to the significant proportion of the population living in poverty or, otherwise, subject to the effects of economic fluctuations, in settings of structurally high levels of socio-economic inequality (Uthoff and others, 2005).

Despite their importance, the knowledge on intergenerational transfers in the region is relatively limited. One practical problem has been the lack of readily accessible information on income/productivity, consumption, and public and private transfers, classified by age, as well as the scarcity of primary data sources that would allow for a truly generational/inter-temporal examination of these age schedules over extended periods of time. This is a real limitation in most countries, although there are several sources already available that could be usefully exploited to advance the knowledge in this area.

Another factor may be that national governments have had to deal with many acute and pressing short-term macroeconomic problems such as recession, unemployment, external adjustment, and difficulties in the management of national debt, which, in certain countries and periods of time, have indeed been quite serious. In this context, concerns over the intergenerational redistribution of income have, in general, received low priority in discussions of what are perceived to be the most urgent public policy issues. However, this is not a sound justification for neglecting the issue of intergenerational transfers. The intergenerational, inter-temporal analysis of transfers can be very useful, for example, for advance detection of disequilibria implicit in the combination of population trends and the continuation of current programmes or policies. They can thus help to identify policy options that can contribute to avoiding future crises. Also, the capacity of familial or inter-household transfers to compensate for the changes in public spending for social protection is key in determining the final effects that the economic cycles and governmental policies have on the well-being of the population.

Finally, and at least as important, the relative scarcity of information and analysis of intergenerational transfers is probably related to the fact that, until relatively recent times, there was no comprehensive, systematic theoretical basis nor standardized accounting principles to analyse the ensemble of intergenerational transfers. In fact, the study of these questions in the region has been for the most part fragmentary and, with a few exceptions, not comparable across countries. In this regard, the theoretical and accounting frameworks of Auerbach, Gokhale and Kotlikoff (1991) and Auerbach, Kotlikoff and

Leibfritz (1999) for the analysis of equity and sustainability of fiscal policies and the framework of Mason and others (2005) for the analysis of all types of transfers are very helpful.

Before proceeding to the discussion of the different types of transfers, figure 1 illustrates the size, broad shape and net direction of inter-age reallocations in Chile, Mexico and El Salvador. Note that the consumption curves depicted here refers to private consumption only and are therefore not strictly comparable to those of Mason and others (2005), Turra (2005) or others that include also the consumption of publicly provided goods and services.

Preliminary estimates of the total amount of intergenerational transfers in these countries² suggest that they are indeed substantial as they represent between 36 per cent and 42 per cent of the total labour income and between 30 per cent and 39 per cent of aggregate consumption. In all cases, there are sizeable income-consumption deficits for young dependents and lesser overall deficits for older dependents, both of which are financed with reallocations coming mainly from the surplus of income over consumption of the working-age population. The relatively greater volume of transfers toward younger dependents is to be expected in countries with relatively young age distributions and not highly developed welfare systems for the elderly.

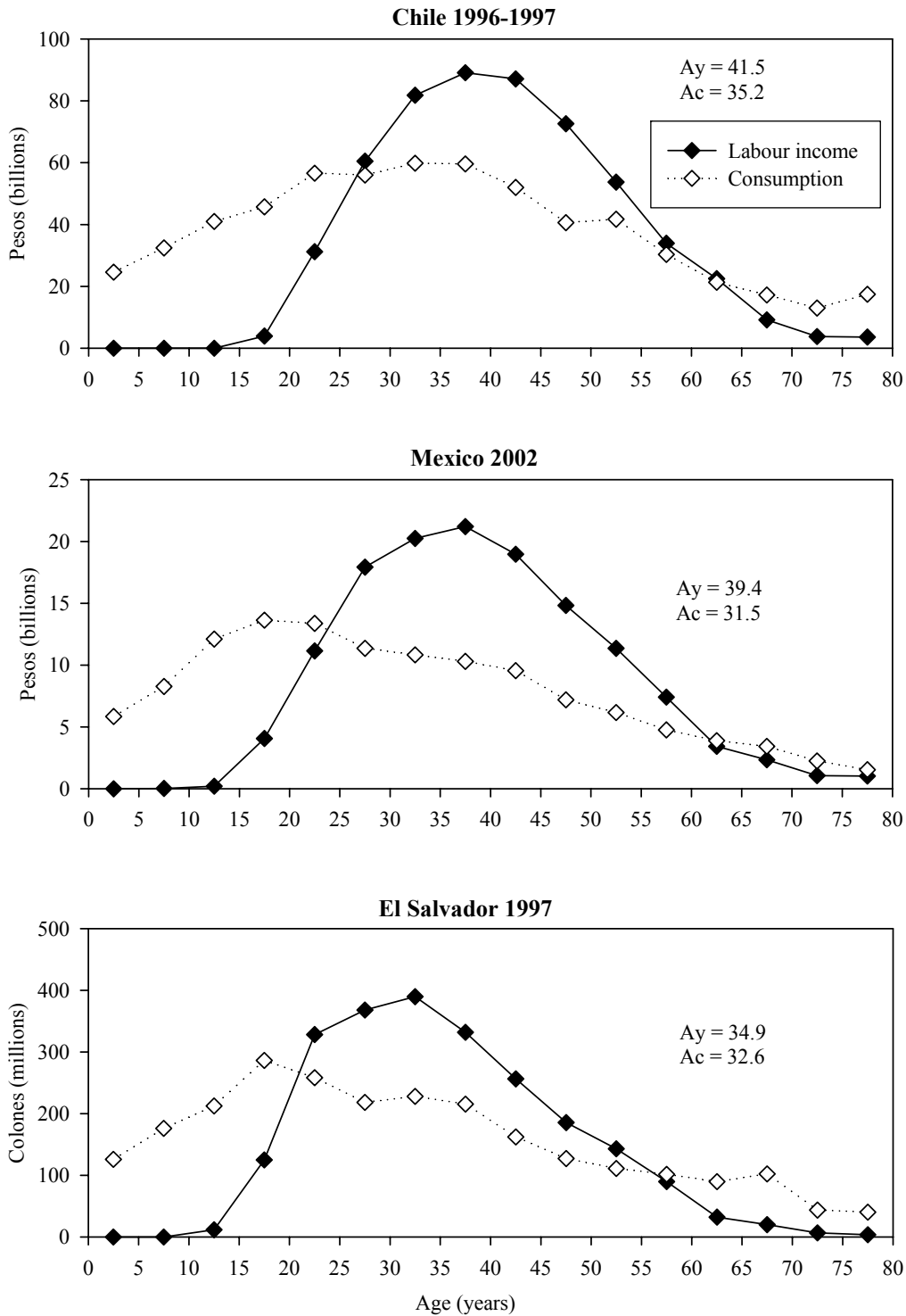
There are some significant differences across countries. Chile has a higher average consumption age than Mexico and El Salvador, which is due mainly to Chile's older population. The lower average age of labour income in El Salvador, in comparison with Mexico and even more so in relation to Chile, is due to El Salvador's younger population and the significantly higher income of older adults in Chile than in Mexico and El Salvador. The graph shows that the age at which net consumers become net producers is highest in Chile, somewhat lower in Mexico, and lowest in El Salvador - a pattern directly proportional to the degree of ageing of their respective populations. In the same vein, the younger the population age distribution, the earlier the age at which older adults become net consumers. Irrespective of these differences, however, there is a clear aggregate net "descending" average pattern of reallocations,³ from older to younger ages, a common situation in less industrialized settings (Lee, 2003; figure 2).

How much of the transfers are channelled through the State, what proportion of them are familial/private, and what distributional effects do they have? These are the questions addressed in the following sections on the basis of the available evidence for Latin American countries.

A. DISTRIBUTIVE EFFECTS AND SUSTAINABILITY OF PUBLIC SPENDING AND TRANSFER PROGRAMMES

There is an increasing recognition by fiscal analysts and policymakers of the usefulness of taking into account the age-specificity of public spending and transfers, as a complement to the traditional analyses of incidence of fiscal policy by income levels, and to the traditional budget assessments and projections based on aggregate deficit and public debt indicators. An important reason for this is that the traditional budget measures become less appropriate for assessing the sustainability of current policies, in the context of rapid population ageing and a sharper focus of government policy on social programmes that are age-related (Gokhale and Smetters, 2004). In fact, a number of industrialized countries, concerned by the effects of their ageing populations on government spending for pensions, health, long-term care and education, have been explicitly incorporating the generational dimension of public budgets for some time now. These analyses have made it possible to evaluate alternative inter-temporal finance strategies for these sectors and for public spending as a whole. Recent studies along these lines include those of Heller and Hauner (2005), Comley and McKissack (2005), and Gokhale (2005).

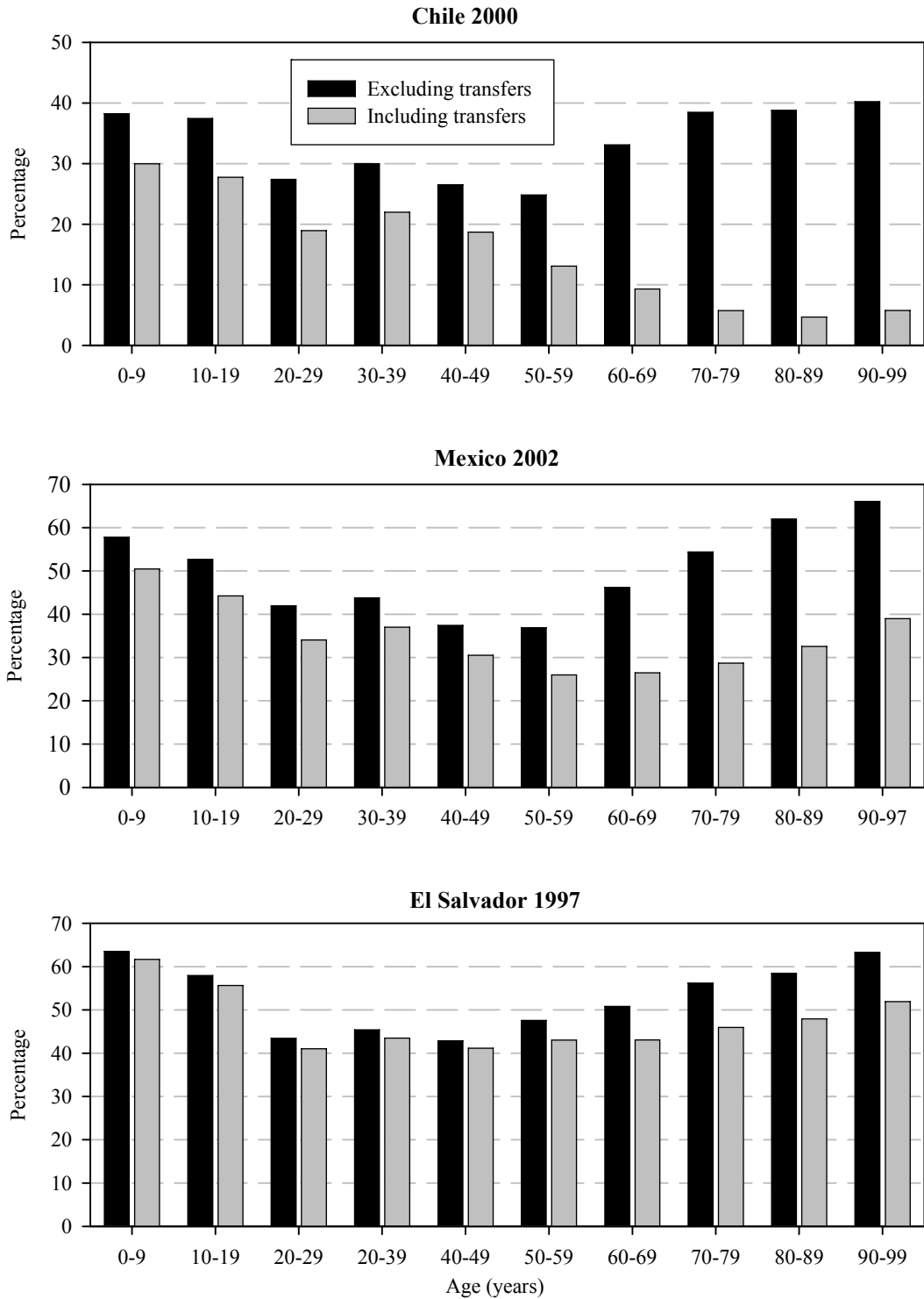
Figure I. Private consumption and labour income by age, Chile, Mexico and El Salvador



Sources: Encuesta de Presupuestos Familiares 1996/97, INE (Chile); Encuesta Nacional de Ingresos y Gastos de los Hogares (ENIGH) 2002 (México); Encuesta de Hogares de Propósitos Múltiples 1997 (El Salvador).

NOTE: Ay = Average age of labour income; Ac = Average age of consumption.

Figure 2. Incidence of poverty by age group excluding and including transfers, Chile, Mexico and El Salvador



Sources: CASEN 2000 (Chile); Encuesta Nacional de Gastos e Ingresos de los Hogares (ENIGH) 2002 (México); Encuesta de Hogares de Propósitos Múltiples 1997 (El Salvador).

A few countries in Latin America have undertaken analyses of the distributive effects of taxes and public spending that correlate with age, such as education, social security and some health programmes, with varying degrees of specificity. Arenas and Guzmán (2003) and Arenas (2005), analysed some broad distributional effects of public social spending and the countercyclical nature of the country's "fiscal surplus" policy⁴ in the case of Chile. Government transfers have been concentrated in children's education and nutritional programmes, and health and social security for retirees as well as assistance for the elderly poor. As for their distributional impact, the evidence suggests that over the last decade, fiscal policy and especially social spending, has had a substantial positive effect on the reduction of poverty from 38.6 per cent in 1990 to 20.6 per cent in 2000. Public policy has also, in good part, compensated for the effects of the short-term economic cycles, thanks to the fiscal surplus rule in place, which has also made a key contribution to the medium- and long-term financial sustainability of the overall budget and, in particular, of social programmes.

In a different setting, Paes de Barro and Carvalho (2003) showed that social spending in Brazil has not been very effective in improving income distribution or poverty levels between 1981 and 2001.⁵ According to the authors, there are several factors that explain this situation, the most important of which is the lack of distributive focus of social programmes. They report that in two cases one, a childcare programme aimed at poor children aged 0-6 years and another, for children and teenagers aged between 6 and 15 from poor families (*Bolsa Escola*) - the distribution of resources among states does not correlate well with the target population in those age groups. More recently, the Government of Brazil has launched a new programme, *Bolsa Família*, that unifies a number of previous transfer programmes aimed at poor families and intends to improve efficacy in producing a more progressive (that is, inequality-reducing) incidence of social spending (Brazil, 2005).

The authors also warned about the generational distribution of resources for social public spending, again, from a poverty-reduction perspective. "Compensatory" transfer programmes have been found to be much more beneficial for the elderly than for children (Paes de Barros and Carvalho, 2003), with the result that, after transfers, child poverty rates are more than triple those of the elderly. Turra and Queiroz (2005) arrived at a similar general conclusion on the differential age incidence of transfers through an in-depth examination of 1996 data.

Mexico provides another interesting example, since it was one of the few Latin American countries that reduced inequality and poverty levels between 1999 and 2002. A detailed study of the distributive effects of different types of taxes and expenditures in 2002 (Mexico, 2004)⁶ found that transfers, both from the Government and from other households, helped to reduce inequality (as measured by the Gini coefficient⁷) by 3 percentage points when assessed with total household income, or by 1 percentage point with income per capita. Much of public spending in Mexico on education, pensions, electricity subsidies and transfers from programmes such as *Progres/Oportunidades* and *Procampo*, are targeted at specific age groups. The most progressive programmes are pre-school and primary school education programmes, health programmes for the entire population, and *Oportunidades*, a (conditional) cash-transfer programme for poor families. On the other hand, spending on state pensions (ISSTE and IMSS) and institutional/formal health plans are assessed to be quite regressive. In spite of the latter, when the ensemble of taxes paid is compared to the total benefits and cash transfers received from the Government, the net redistributive impact of fiscal policy is found to be progressive.

Perhaps, the study that has most clearly considered social spending by age groups is that carried out for Costa Rica (Trejos, 2005; see also Estado de la Nación, 2004), which examines changes in the distribution of fiscal spending during the 1990s according to income quintiles and regional, generational and gender variables⁸. The study shows that, between 1990 and 2002, "social public investment" increased in real terms and improved the (after-transfer) income distribution, especially in programmes aimed at teenagers (12-17 years of age) and the over-50 population. However, in per capita terms, it is

children under-12 years of age and the elderly that benefited the most from increased spending. These effects came hand in hand with the greater increase in spending on basic education and especially on social security, the sector found to be the most regressive of all the programmes studied. Thus, despite the overall increase in social spending (referred to in the paper as “social investment”), there is concern over the restrictions imposed on spending in other sectors, particularly in higher education. In fact, spending on higher education has decreased in real absolute and relative terms over the period analysed, a trend that, if continued, could well damage the present and future competitiveness of the Costa Rican economy.

The studies reviewed in the foregoing constitute good advances towards a more systematic and integral examination of intra- and intergenerational distributional incidence of taxes and public spending, although the data, definitions and methods used vary from one country to the other and, therefore, the results are not easily comparable. A more consistent examination of these issues is possible using “generational accounting”, an analytical approach specifically designed for this purpose, to which the discussion turns next.

B. GENERATIONAL ACCOUNTING IN LATIN AMERICAN COUNTRIES

Generational accounts measure, in present value, the taxes paid over a cohort’s lifetime net of benefits received from the public sector. They show whether the continuation of current policies is financed in an intergenerationally fair manner or it imply passing a net cost to future generations. Generational accounting is thus the flip side of the inter-temporal fiscal balance and serves to evaluate the sustainability of current policies and their projection into the future.

This approach seems to be particularly appropriate for analysing social protection systems and policies because it explicitly considers the associated intergenerational transfers, the present and future solvency of the fiscal systems as they are affected by demographic ageing, and the final consequences on the population groups that the programmes seek to protect.

Of course, small differences in the generational accounts in one direction or another should not be a cause for alarm, especially when a political consensus can be achieved by current generations to take responsibility for the inter-temporal financing of current policies. It is well-known that the estimates of generational accounts, as defined above, are sensitive to several assumptions in the accounting framework (Auerbach, Kotliff and Leibfritz, 1999; Haveman, 1994; Bonnet, 2002). Some examples are assumptions regarding the discount rate to convert future flows into present values and the classification of some items of public spending as transfers rather than governmental consumption or investment (especially in the areas of health and education). It would, therefore, be inappropriate to attach great significance to small differences in the value of generational accounts in any given country or to differences between countries at a given moment in time. However, there would be a legitimate cause for concern and intervention, if the net sum of lifetime taxes, transfers and government expenditure (the generational balance) imposed disproportionate net tax burdens for some groups in comparison to others or if they implied a large absolute burden for one or more generations.

In Latin America, a literature search for this paper found studies on generational accounts for Argentina, Brazil and Mexico⁹. In the study of Argentina, Altamiranda (1999) evaluated the sustainability of fiscal policy and the “convertibility plan”, implemented during the first half of the 1990s, which included a privatization programme and the beginning of pension system reform. The author estimated that the privatization programme, which generated fiscal income of US\$18.7 billion between 1990 and 1994, had nonetheless a negative impact on net national wealth of US\$9.9 billion (equivalent to 3.5 per cent of GDP in 1994). Moreover, the privatizations increased intergenerational imbalances (defined as higher net taxes to be paid by future generations in comparison with those alive today) by 2 per cent to 10 per cent, according to the assumptions made, added on to base imbalances of 70 per cent to 124 per cent.

The introduction of social security reform produced a generational imbalance equivalent to a permanent reduction of pensions of between 33 per cent and 48 per cent. Also, given that almost 60 per cent of private pension funds had been invested in state bonds (circa 1995), that particular form of investment of pension fund assets had little effect on government inter-temporal balance. This is because although the net present value of taxes decreased, the national debt stock rose¹⁰, meaning that there was a change in composition rather than in the level of the inter-temporal budget.

Taken as a whole, the policies of the first half of the 1990s are considered by Altamiranda (1999) to be unsustainable. They imply the transfer of a net tax burden to future generations of 75 per cent to 150 per cent, which is greater than that borne by taxpayers in 1995. Thus, according to the author, what appeared to be an initially balanced and macro-economically stabilizing adjustment, evaluated on the basis of the period flows, had implicitly substantial inter-temporal and intergenerational imbalances. The ageing population is one of the factors behind this imbalance, with a weight that varies according to other assumptions in the model. A more recent study by Cetrángolo and Jiménez (2003) provides a detailed and more nuanced assessment of the fiscal policies over the last decade and a half, but it concurs with the previous analysis in identifying the insolvency of the reformed social security programme, together with a series of internal and external problems, as a key factor of the fiscal imbalance that contributed to the severe 2001-2002 economic crisis.

The analysis carried out in Brazil (Malvar, 1999) follows a methodology very much in line with that used in the Argentina study and those of other countries examined in Auerbach, Kotlikoff and Leibfritz (1999). Brazil displays an even greater imbalance in generational accounts than Argentina, as the net tax burden for future generations is estimated (in the base scenario) to be 116 per cent greater than that of taxpayers in the mid-1990s. The ageing population plays an important role (the imbalance would decrease by almost half had the demographic structure remained stable) as does the growth of the national debt, although to a much lesser degree. As in the Argentinean case, the imbalance is found to be related, for the most part, to the insolvency of the social security system, which was worsened by legislation incorporated into the 1988 Constitution. The 1988 Constitution instituted improvements in benefits and even lowered the retirement age for rural workers, without securing adequate funding for those measures.

To reinstate the inter-temporal balance in Brazil in the mid-1990s, it would have been necessary to make such drastic adjustments, such as a permanent cut in government spending of 26.2 per cent and a tax increase of 11.7 per cent (including social security contributions), or a reduction in public transfers to workers of 17.9 per cent. If no adjustments are made, the net payments of future generations will continue to grow substantially. The author highlighted the necessity and importance of correcting these imbalances, not only for intergenerational equity considerations. Since the elderly, who have disproportionately benefited from net government transfers, have a relatively high propensity to consume, the correction of the imbalance would also have a positive effect on savings and growth.

The generational accounting analysis for Mexico, carried out by Sales and Videgaray (2000) concludes that Mexican fiscal policy, as assessed in 1999-2000, did not present an inter-temporal imbalance.¹¹ In fact, a (positive) balance of 11 per cent was found in favour of future generations; in other words, those born after the year 2000 are projected to face a tax burden 11 per cent lower than the preceding generations. The study follows the same basic methodology as in the previously mentioned studies, with several differences. First, it is clear, as the authors state, that in Mexico the oil sector plays an important role in the results as this sector provides a very large proportion of tax revenue - more than 30 per cent - and oil production significantly affects aggregate economic growth. For this reason, the study pays special attention to this sector.

Secondly, some assumptions in the Mexico study seem less realistic than those of the studies already mentioned. In particular, the change in the Mexican demographic structure from 2030 onwards was

assimilated to that of the United States and, for pension payments, the age profile as the United States social security system was adopted.¹² Finally, spending on education was not included in the accounting, as no data were available at the time the study was made. This could also be remedied by using information that became available subsequently. In any case, as the authors note, the non-inclusion of education in the accounts biases the result downward, i.e the balance would be even more positive than reported.

In summary, different situations exist in Latin America regarding the effect of public expenditure and transfers on income distribution and generational equity. There are cases of globally progressive redistributive effects in Chile, Costa Rica and Mexico, and also cases of low distributive effectiveness, as in Brazil. There are cases of significant intergenerational imbalances in fiscal policy, which are affected by the degree and speed of population ageing and by the insolvency built in some policies and reforms concerning the pensions system (Argentina and Brazil in the 1990s). In other settings, there is evidence that the overall fiscal position and transfer programmes are intergenerationally balanced and sustainable over time (Mexico and Chile, circa 2000).

C. PRIVATE TRANSFERS

Private transfers are important in all regions of the world. In Latin America, they are presumably important because of the significant role that family ties play in support networks and because the coverage of social protection systems in the majority of countries is far from universal. However, the studies on private transfers are much scarcer than those regarding public transfers, as there are data limitations in the majority of countries that impede a detailed and systematic analysis. Nonetheless, the information that does exist sheds some light on the circumstances under which private transfers occur in the region and the sort of effects they have.

Some studies are of reduced geographical scale and are based on small samples of households, such as that carried out by Kaufman and Lindauer (1984) in El Salvador¹³, with the objective of examining monetary transfers between households and their role in maintaining “minimum” family consumption. The study found that a third of households were receiving private transfers and that they accounted for 11 per cent of the total income of these poor households. Households headed by women were more likely to receive transfers than those headed by men (60 per cent and 25 per cent, respectively), and the amount of the transfer was inversely related to the recipient household’s earned income.

The transfers appear to serve to satisfy basic needs and to alleviate poverty in recipient households, but they take place for the most part within the “extended family” context. Consequently, the observed progressive redistribution has limited scope and does not come close to substituting for the public sector redistribution needed for poverty reduction. The authors suggest that transfers may be provided for altruistic or even paternalistic motives, although they could also well be the result of a social contract aimed at reducing the risk that basic consumption needs would go unmet.

Several other studies on private transfers are based on surveys representative of large cities (Saad, 2005b), the urban population of some countries (Cox, Eser and Jiménez, 1996) or, more exceptionally, are representative at the national level (Torche and Spilerman, 2005; Wong and Espinoza, 2005), with a main focus on older adults.

Two recent studies by Saad (2005a, 2005b) stress the key role of co-residence in facilitating different types of intra-familial support and material transfers, as well as in improving the well-being of older adults in the Latin American and Caribbean countries. Also, evidence obtained for four major cities (Sao Paulo, Buenos Aires, Montevideo and Mexico City) shows that the population over age 50 is involved in reciprocal support and exchanges, with the same and different generational groups. The intense exchanges

documented point to a possibly partial compensation for insufficient public transfers to support the needs of the elderly and also hint at an important role of the older population as a source of support for other family members in contexts of adverse economic conditions.

Taking the case of Mexico, Wong and Espinoza (2005) examined the changes in transfer between persons aged 50 or over and their children (or other non-family members under the age of 50) during the period 2001-2003. They paid particular attention to individuals that switched from being donors to recipients of transfers and vice-versa in a multivariate framework. The results showed that persons over age 50 decreased their propensity to make transfers over time. Age is an important factor, which has a positive correlation with ceasing to be donors and with becoming transfer recipients. Widows and adults with many children are more likely to be recipients of transfers than other persons of the same age. As may be expected, individuals with higher incomes are less likely to be recipients and more likely to be donors, a finding consistent with those of Saad (2005b) for the four metropolitan areas mentioned above. Contrary to expectations, the individual's health status does not appear to affect the likelihood of receiving or making transfers.

Torche and Spilerman (2005) used a retrospective survey of "intergenerational financial linkages" carried out on 4,408 households in Chile in 2003 to study the extent to which the wealth of parents affects the standard of living and possession of assets of their children when they reach adulthood. The study confirmed that children's economic status has a high correlation with their parents' income when the children were young, and showed that the dominant intervening variable is the children's educational level. The authors concluded that investment in human capital (education), which positively and directly affects their level of labour income, is the main direct determinant of the children's current standard of living. They also note that the high standard of living enjoyed by some children raised in low-income families could be due, at least in part, to public education and other social programmes. This hypothesis, if confirmed through more rigorous testing at the micro level, would bear out the conclusions reached by Arenas and Guzmán (2005) at the macro level regarding the efficacy of the redistribution of government expenditure and fiscal policy.

For the second dependent variable, the ownership of assets, the results are somewhat different. The variables representing parental economic status did not appear to be significant, except for parental household wealth. When the children's characteristics are controlled for, parental wealth continues to be significant, but to a lesser degree. The authors concluded from this evidence that parents transfer wealth to their children directly in the form of physical or financial assets (as opposed to human capital formation, the main vehicle for the intergenerational transmission of the standard of living). In any case, some care would be warranted in interpreting the distinct results, as income and wealth are so closely associated that it is difficult to tell their determinants apart.

Cox, Eser and Jiménez (1996) studied transfers between parents and children in urban areas of Peru and the variables that determine them, including income, education, and some household characteristics. They also discuss whether the motives behind such transfers could be altruistic or the result of implicit contracts of inter-temporal mutual assistance. They find in all cases that the probability of receiving transfers over the life cycle is U-shaped and has an inverse relationship with life-cycle earnings (which has an inverse U-shape). This provides some direct confirmation, once again, that transfers between parents and children provide important "smoothing" of life-cycle consumption. The amount of transfers given from parents to children has a sign that changes from positive for income up to 2,900 soles, to negative marginal effects above that level. Similarly, the amount transferred by children to parents increases for income levels up to 3,700 soles and stabilizes or slightly decreases thereafter. As the authors explained, these findings do not seem consistent with altruistic motivations, which would imply an overall *negative* effect of the recipients' income on the amount of the transfer received.¹⁴

Interestingly, it was also found that the level of social security benefits had a negative effect on the amount of transfers from children to parents, which suggests some substitution of private transfers for those provided by the government. It was also found that ill health and unemployment increase the likelihood of receiving transfers.

In sum, the studies reviewed indicate that transfers are indeed an important means to smooth consumption over the life cycle and, in some settings (e. g., poor neighbourhoods in El Salvador), over the economic cycle as well. In general, families or individuals with lower income or that are otherwise disadvantaged are more likely to receive transfers, but the motive is not always clearly altruistic. In fact, in some cases (e. g., urban Peru), the evidence seems more consistent with an exchange motive. All the studies suggest that intergenerational support transfer is a two-way process in which every generational group includes both recipients and providers.

D. REDISTRIBUTIVE AND POVERTY-REDUCTION EFFECT OF TRANSFERS

It was seen in the previous sections that, in general, public transfers have had an overall redistributive effect, especially in the case of education, health and cash transfer programmes that benefit primarily young children. In some cases, however, pension and other programmes for older persons were found to be regressive in the traditional sense of incidence according to income class. Private transfers, studied for the most part through small or medium-scale surveys, seem to serve different purposes and have more complex effects according to the specific setting. In all cases, they seem to benefit individuals in the dependent ages and, in many cases, they confer greater benefits on individuals with relatively lower income or that are otherwise disadvantaged. However, in at least some settings, private transfers between parents and children correlate positively with wealth and income, thus providing a mechanism for an intergenerational reproduction of economic well-being.

This section examines further the data presented in the opening section relative to nationally representative household surveys in Chile, Mexico and El Salvador. The analysis follows up on a previous, detailed study by Uthoff and Ruedi (2002) that examined the efficacy of cash transfers in alleviating poverty in seven Latin American countries in 1996-1997, using information on monetary transfers from household surveys. That study showed that transfers, both public and private, accounted for 4 per cent to 22 per cent of total household income in the countries studied, and that they had a “poverty-reduction” effect between 2.5 and 13.4 percentage points, depending on the country.

More specifically, the study found that transfers had a substantial effect mainly on economically inactive household heads aged 65 and over, and had little effect in reducing poverty among the unemployed. This can be explained by the fact that, compared to unemployment insurance and despite their limitations, social security and pensions benefit more people and account for a larger proportion of Government social expenditure. The study showed that in households headed by unemployed or low-income individuals aged 25-64, transfers reduce poverty from 37 per cent to 30 per cent, while the effect on the total population is to reduce poverty from 43 per cent to 29 per cent.

Estimates using data from the most recent surveys in Chile, Mexico and El Salvador showed that transfer income, as measured in the respective surveys, accounted for 14 per cent of total income in Chile, 15 per cent in Mexico and 9 per cent in El Salvador. These transfers helped to reduce poverty by 18 percentage points in Chile, 9 percentage points in Mexico and 3 percentage points in El Salvador. The different degrees of efficacy are due mainly to the fact that the aggregate value of transfers in Chile and Mexico, amounting to 15 per cent and 14 per cent of total income respectively, was higher than that in El Salvador, where it accounted for only 9 per cent of total income.¹⁵

Figure 2 illustrates the different effectiveness of transfers in reducing poverty in the three countries by showing the poverty rates for different age groups, excluding and including cash transfers. It can be noted that in the three countries the compensatory effect on poverty is proportionately higher among the elderly than in the rest of the population, especially in comparison with children and teenagers.¹⁶ In general, younger individuals display near or below-average incidence of poverty when transfers are excluded. However, when transfers are included they have above-average poverty rates. Except in the case of El Salvador, poverty rates among younger individuals are significantly higher than among older adults.

These estimates suggest that there is room for considerable improvement in the redistributive effect of transfers. Also, the effect across generations is not necessarily balanced, as transfers tend to be biased towards the elderly, which can certainly be justified in terms of the aims of the social security systems. However, viewed from a broader perspective of intergenerational solidarity and productive efficiency, those aims should not lead to the neglect of other population groups, especially children and teenagers, who are subject to high poverty rates in almost all of the countries studied. As mentioned before, in some settings, this problem is compounded by the deficiency of transfers for secondary and higher education, which could jeopardize present and future productivity growth.

E. FINAL REMARKS

Intergenerational transfers in Latin America are of a substantial aggregate magnitude. In practically all documented cases, they are essential in smoothing life-cycle consumption and contribute significantly, although in varying degrees, to alleviating poverty.

Public transfers are not always strongly redistributive. In certain countries and sectors, they have been assessed to be rather regressive and tend to favour some generational groups much more than others. In several countries, public transfers have a greater poverty-reduction effect among older adults than among children, which continue to weigh heavily within the poor population in most countries of the region.

Even in countries where government transfers are sizeable, private transfers play a key role in the support of different generational groups. However, the redistributive effect of private transfers is even less clear-cut than in the case of public transfers. In many cases they appear to be directed foremost towards individuals with lower incomes but, in other situations, they tend to favour to a greater extent those who are relatively better off, thus providing a basis for an intergenerational reproduction of poverty and wealth. Some evidence was found of substitution of private for public transfers. However, private transfers appear far from sufficient to replace the state responsibility over the provision of social services and protection to the population as a whole.

The combined analysis of changing demographic structure and age-specificity of public programmes and transfers shows that, in some countries, the ensemble of social programmes and fiscal policy appears to be inter-temporally unbalanced, with ensuing serious budgetary and macroeconomic consequences in the medium- and long-term. Population ageing and the insolvency of social security systems are among the important factors of the imbalances. These situations have a flip side in intergenerational inequity, as future generations are burdened with significantly higher net taxes than the present ones to finance the continuation of policies into the future.

There are important advances in the knowledge and analysis of these types of questions in several countries, but there is clearly much room for improvement in the region for the development of a more systematic information basis that would allow for periodic, more precise and comparable diagnosis. As can be appreciated from many of the cases reviewed, such information can make a valuable contribution in identifying policy options to improve the intra and intergenerational distributive equity of policies and social protection programmes.

NOTES

¹ Other useful criteria for classifying reallocations and transfers distinguish a) the channel of transmission: the family, financial institutions/markets, or the state, and b) their direction, i.e. those “ascending” from younger to older generations, or “descending”, from older to younger generations.

² Based on consumption and income data from household consumption/budget surveys in each country depicted in figure 1, assuming that the consumption deficit of young dependents is entirely financed by transfers.

³ Evidenced by an average age of income higher than that of consumption.

⁴ The fiscal policy, whereby the Government sets its spending level for the purpose of stabilizing the economy, aims at a structural surplus of 1 per cent of GDP, with provisions for permitting spending to rise during periods of economic contraction and for avoiding fiscal expansion during periods of rapid economic growth (Eyzaguirre, 2005).

⁵ Although the percentage of extreme poverty in Brazil has decreased by some 10.5 percentage points, a very good overall performance, 90 per cent of the result was due to improved economic growth, and only 10 per cent was due to improved income distribution.

⁶ The national survey on household income and spending (ENIGH) of 2002 was the main source of information. This was complemented with data from the accounts of the Federal Treasury, which includes national accounts, records from the Mexican social security institute (IMSS) and other state entities. Data from nutrition, health, and other surveys, as well as an evaluation of the *Progres*a programme were also used.

⁷ The Gini coefficient, which is a measure of inequality in a population, ranges from a minimum value of zero, when all individuals are equal, to a theoretical maximum of one.

⁸ The beneficiaries of State programmes were identified on the basis of the multi-purpose household surveys (EHPM) and the national survey on social investment (ENISO). Subsequently, public social investment was allocated to individuals in proportion to the distribution of beneficiaries per programme. In this way, it was possible to classify the level of investment according to income, age group, gender and geographical area, and to calculate the corresponding distributional changes between 1990 and 2002.

⁹ Generational accounting or models based on it have also been applied to specific sectors or reforms, for example the assessment reforms of national pension systems in Chile and Uruguay.

¹⁰ This kind of effect occurs, in different degrees, in all of the reforms that introduce or increase prefunding, where a substantial proportion of the pension funds are invested in public debt.

¹¹ Chile is another country with evidence of inter-temporal sustainability of its public budget, based however on sustainability indicators different from those of generational accounting (see Crispi and Vega, 2003).

¹² It would surely be better to use the projections available for Mexico, and to estimate the age schedule of pensions from the Mexican 2002 national survey of household income and expenditure instead. However, the results for the aggregate generational balance would probably not change drastically.

¹³ Based on a survey of 500 households in poor districts of the city of Santa Ana, compiled in 1976.

¹⁴ The evidence appears in fact, more consistent with the theory of implicit inter-temporal contracts, according to which parents agree to transfer more resources to their children in the expectation that they will in turn provide larger transfers to the parents in their old age. This can also explain transfers from children to parents, to the extent that they increase the likelihood of future bequests.

¹⁵ The proportion of transfers directed towards poor households in El Salvador is similar to that of Chile and higher than in Mexico; therefore, the lower efficacy of transfers in reducing poverty in El Salvador in comparison to Chile and Mexico is due primarily to the smaller relative size of transfers in El Salvador.

¹⁶ This same effect was observed in Brazil by Paes de Barro and Carvalho (2003).

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