

THE INTERLOCKING OF TIME AND INCOME DEFICITS:

Revisiting poverty measurement, informing policy responses











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"The interlocking of time and income deficits: Revisiting poverty measurement, informing policy responses"

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KNOTS
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THE INTERLOCKING OF TIME AND INCOME DEFICITS:

Revisiting poverty measurement, informing policy responses

Rania Antonopoulos, Thomas Masterson and Ajit Zacharias



Prologue

With this third publication of the "Undoing Knots, Innovating for change" booklets, the United Nations Development Programme (UNDP) Regional Centre for Latin America and the Caribbean, through its Gender Practice Area, again provides Latin American and Caribbean governments and citizens with an innovative reflection that contributes to the necessary gender transformations to the achievements of equality goals.

This re-examines and proposal institutionalizes an old practice from UNDP's regional project "America Latina Genera: knowledge management for gender equality" (www.americalatinagenera.org): creating knowledge products designed to promote dialogue and discussion on themes of gender equality. This project is now part of UNDP's Gender Practice Area, an area that links and coordinates different regional initiatives for gender mainstreaming and women's empowerment, provides technical and substantive support for national and regional capacity development, creates learning communities, and builds alliances to promote strategic actions to eradicate inequalities.

As the name indicates, these booklets seek to untie knots, connect the dots, and overcome obstacles to make progress in gender equality; they also attempt to highlight transcendental themes, provide new perspectives on long-running debates, move a step forward on traditional solutions, and look for alternative paths in social and economic policy.

Poverty (LIMTIP) that proposes this brief is a two-dimensional measure that jointly tracks income gaps and time deficits. Using this alternative measure, we present selected results of empirical estimates of poverty and compare them with official income poverty rates for Argentina, Chile, and Mexico, with a focus on the policy implications of the study.

"Undoing Knots, Innovating for change" presents today a policy brief: "The interlocking of time and income deficits: revisiting poverty measurement, informing policy responses", that includes findings from a research project undertaken in 2011 by the Levy Economics Institute with UNDP support. The objective of the document is to propose an alternative to official income poverty measures that takes into account household production (unpaid work) requirements. Yet, its significance for attaining a minimum standard of living has not made sufficient inroads in academic and policy discourse. As a result, official poverty estimates still largely ignore the issue. This has consequences for policy making. The Levy Institute Measure of Time and Income

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Acknowledgments

This policy brief presents findings from a research project undertaken by the Gender Equality and the Economy and the Distribution of Income and Wealth programs of the Levy Economics Institute. It draws upon a Research Project Report that, alongside several other relevant documents, can be found at www.levyinstitute.org/research/?prog=20 and www. americalatinagenera.org. The project was undertaken during 2011, with the support of the United Nations Development Programme Regional Service Centre for Latin America and the Caribbean (UNDP RSC-LAC) and in particular of RSCLAC Gender Practice Area. In addition, the International Labour Organization (ILO) provided support for the case study in Chile. Last but not least, we are indebted to our colleagues for their research contributions and background documents: for Argentina, Valeria Esquivel, Instituto de Ciencias, Universidad Nacional de General Sarmiento; for Chile, María Elena Valenzuela and Sarah Gammage, ILO; and, for Mexico, Mónica E. Orozco Corona, Instituto Nacional de las Mujeres, Government of Mexico, and Armando Sánchez Vargas, Universidad Nacional Autónoma de México.

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1. Introduction

It is widely acknowledged that basic needs and other conveniences of life are fulfilled through three channels: purchases of commodities from markets, access to social services and public goods provided by the State, and dedication of time to unpaid household production activities. Proposals that recognize the critical importance of the latter— that is, of unpaid household production—for measuring Gross Domestic Product and economic wellbeing have been around for some time. In fact, following the 1993 System of National Accounts (SNA 1993) recommendations, several countries have produced a variety of satellite accounts that have directly documented the contributions of unpaid work which, as time use data reveal, are mostly provided by women.

Yet, its significance for attaining a minimum standard of living has not made sufficient inroads in academic and policy discourse. As a result, official poverty estimates still largely ignore the issue. This has consequences for policy making. If poverty is not measured

accurately, its real breadth and depth remain invisible. If the underlying causes of poverty are not fully accounted for, it cannot be hoped to be redressed by policy.

The trouble with standard measurements of poverty is that they tacitly assume that all households and individuals have enough time to attend to the daily household (re) production needs of their members. But what if this assumption is false? For example, the poverty line may be based on a frugal food budget that assumes that all meals consumed are prepared at home. The oftenforgotten corollary of such an assumption is that some members of the household are supposed to have enough time to spend on shopping, cooking the meals, and cleaning up afterwards. In other contexts, the assumption implies that the time spent in collecting free goods or fetching water and firewood is not a constraining factor. As yet another example, the poverty line may not include the expense of childcare, thus implicitly assuming that families with children always have sufficient time (or unpaid help from others) to care for their children. In such instances, do "time deficits" really matter?

Lack of time in some cases may be mild. But in other instances it can be forbidding, preventing the attainment of even a bare bones living standard. Should a household officially classified as nonpoor be facing a time deficit, and should it also be the case that it does not have the option to make up for it by purchasing market substitutes, that household will be encountering deprivations not reflected in the official poverty numbers. In other words, though many may experience time pressures on an occasional or daily basis, for some segments of the population such time deficits are literally poverty-inducing but invisible to official income poverty as well as to multidimensional measurements of poverty.

To promote equitable, inclusive and resilient societies it is necessary to give visibility to such hidden deprivations and consider the range of policies that can potentially mitigate them. To this end, the Levy Institute Measure of Time and Income Poverty (LIMTIP) has developed a two-dimensional measure that jointly tracks income gaps and time deficits. While the specifics of the methodology and a full exposition of the findings can be found elsewhere¹, the purpose of this policy brief is to present selected results for the three Latin American countries recently studied, Argentina, Chile, and Mexico, with a main focus on the policy reconsiderations this study invites.



¹ This publication, as well as related publications, can be found at: www.levyinstitute.org/research/?prog=20. The full report of this study can also be found in English and Spanish at: http://www.americalatinagenera.org/es/documentos/LIMTIP%20UNDP%20Report%20Main.pdf . Also see Zacharias, A. 2011. "The Measurement of Time and Income Poverty." Working Paper No. 690. Annandale-on-Hudson, N.Y.: Levy Economics Institute of Bard College. October.

2. Methodology

As mentioned above, the glaring flaw in official income poverty thresholds is that they assume that all households have the ability to allocate a certain minimum amount of time toward required household production. To correct this oversight, the incidence and depth of poverty are evaluated through the use of a new metric—a modified income poverty threshold (the LIMTIP threshold)—by following these steps:

a) Identification of a "poverty-level time requirement" for household production. This is defined as the amount of time that needs to be spent by a household on household production activities to survive with an income around the official poverty line. Of course, poverty-level time requirements or thresholds are not directly available to us like the official income poverty lines. However, they can be, and were estimated for

this study (for 12 types of households, differentiated by the number of adults and children) from available survey data on time allocation and income. Apart from household production, individuals also need some minimal amounts of time for personal care (e.g., sleeping). Therefore, additionally, thresholds of personal care, assumed to apply uniformly to every individual, were estimated from data on time use.

b) Evaluation of whether each household has adult members with sufficient time to meet the poverty-level time requirements. Each individual has 168 hours of total time in a week (24 hours*7 days). If the sum of an individual's weekly hours of (i) minimum required personal care, (ii) employment (as reported in the data), and (iii) the portion of the poverty-level household production time requirement that falls upon the individual exceed the total amount of hours in a week (168 hours), these individuals, and the household to which they belong, are considered to be unable

to meet the poverty-level time requirement of household production; that is, they are time-deficient². Because the threshold hours of personal care are the same for everyone, variations among individuals in their time deficits depend jointly on their hours of employment and the household production time requirements that fall upon them. A number of distinct reasons can therefore account for time deficits: some individuals in the household may be devoting too much time to employment, thus facing an employment time bind; or gendered social roles plus the size and composition of a household may mandate that an exorbitant number of unpaid work hours are needed, resulting in housework time binds for other individuals; or a combination of both time binds may be present.

c) Once the households that face a time deficit are identified, evaluation must take place of whether their time deficit is poverty-inducing. This requires, first, the monetization of their time deficit and subsequently its addition to their official income poverty threshold. This modified income threshold is the household's LIMTIP income threshold. Concretely, if the time-deficient household does not have sufficient income at its disposal

to buy the poverty-level consumption basket plus the market substitutes it needs (e.g., childcare services or readymade meals), then the household is facing a poverty-inducing time deficit. In other words, if for instance, needed paid childcare cannot be bought to replace the time deficit of the household (not without 'forcing' the forgoing of some other essential market purchase from its poverty-level basket), then it can be concluded that time deficits manifest themselves as deprivation—they are poverty-inducing.

d)Having access to income and time profiles, new (LIMTIP) poverty rates at the household and individual level were estimated. Accordingly, the *LIMTIP* incidence of poverty differs from the standard calculations because it adds to the official numbers the "hidden poor," those with incomes higher than the official poverty threshold but not sufficiently high to buy out their time deficits. Measuring the depth of LIMTIP poverty involves adding the revealed income gap that corresponds to the poverty-inducing time deficit. These estimates are calculated at both the household and individual level.3

² We use the terms "time-deficient" and "time-poor" interchangeably. Time use survey data reports the total actual number of hours each individual dedicates to household production within their household. With this information at hand, we can determine each individual's share of the total time his or her household actually spent on household production. The patterns of observed intrahousehold division vary widely in households with two or more individuals, ranging from one person performing the entire amount of household production to equal shares in total household production for all persons. Egalitarian, dictatorial, and patterns that fall in between are all found in the data. Generally, as is well known, women tend to have higher shares than men—a phenomenon that is reflected in our estimates. Once we have determined this share, we adopt the same share for estimating the time each individual dedicates toward the poverty-level time requirement for the household.

³ While surveys of income and consumption expenditures report data only at the household level, without details for each individual household member, time use data are reported for individuals, and this allows us for much more clarity as to who faces time deficits and how severe they are at the individual level.

3. Policy re-considerations of the LIMTIP framework

The LIMTIP poverty estimates, presented in the next sections, are based on current incomes and household production requirements. What we must keep in mind is that the former reflect current earnings plus redistributive taxation and social cashtransfer payments and the latter reflect, inter alia, current levels of public goods and social care provisioning. Given prevailing income and social provisioning levels, the poverty-inducing effect of time deficits with which individuals and households contend is, in fact, substantial. Hidden poverty is present and affects women, men and children alike.

To redress deprivations and income deficits, policies can take three well-known routes. The first route pertains to interventions that

improve labour market outcomes for the poor: wider availability of jobs and better pay. The LIMTIP framework invites thinking along the same lines but also highlights the importance of regulating the length of the working day. If acquiring a minimum level of income requires excessive hours of employment, including commuting time, this is not without consequences, because an employment time bind can prevent participation in household production.

The second route relates to modification of low earned incomes via tax exemptions, tax credits, and in-kind plus cash transfers. In view of the LIMTIP framework, the challenge is to identify the hidden poor, those who are not currently covered (i.e., those facing poverty-inducing time deficits); and to calculate the needed level of intervention so as to match the depth of the income gaps endured by the poor. The results reveal that once time deficits are taken into account, the breadth of poverty is wider and its depth larger than conventionally thought.

The third route aims to expand the living standards current incomes afford through the enlargement of social provisioning.

Whether the state provides for all the LIMTIP poor is of concern, and short of universal provisioning, prioritizing the needs of households whose demographic characteristics reveal them to incur the greatest poverty-inducing household production time deficits must receive consideration.

These are issues raised by ongoing social dialogues whose aim is to build socially inclusive and resilient societies. The inclusive growth, decent job creation, work-family life reconciliation, and social protection agendas are intimately, but at times only implicitly, linked to the nexus of income and unpaid household production responsibilities. In presenting the LIMTIP findings and their policy implications this brief will be making reference to these important agendas as they arise, as the results bring information to the fore that may be beneficial to their formulation.



4. Key findings: what do we learn by accounting for time deficits?

for Chile (Gran Santiago), LIMTIP increases the poverty rate to 17.8 percent from 10.9 percent; and in Mexico, the poverty rate increases to 50 percent from an already high 41 percent (Table 1). This implies that 5, 7, and 9 percent of all households are in hidden poverty in Argentina, Chile, and Mexico, respectively.

This section presents results first at the household level and subsequently at the level of individuals. To explore the poverty reduction dynamics of job creation, findings from a hypothetical scenario in which eligible adults without a full-time job become employed full-time are also summarized.

4.1 The time and income poverty of households

The first finding relates to the incidence of household poverty. The size of the *hidden* poor—namely, those households with incomes above the official threshold but below LIMTIP poverty line—was found to be considerable in all three countries: for Argentina (Buenos Aires), 11.1 percent of the population are in LIMTIP poverty, compared to 6.2 percent for the official poverty line;

Table 1.
OFFICIAL, LIMTIP, AND "HIDDEN" POVERTY RATES
(IN PERCENT) AND NUMBER OF POOR (IN THOUSANDS)

	Official Income-poor		LIMTIP Income-poor		"Hidden Poor"	
	Number	Percent	Number	Percent	Number	Percent
Argentina	60	6.2	107	11.1	47	4.9
Chile	165	10.9	271	17.8	106	6.9
Mexico	10,718	41.0	13,059	50.0	2,341	9.0

The second main finding pertains to depth of poverty. For the group already identified as poor by official statistics, their depth of poverty is much greater than what the standard statistics report: 2.2 times deeper for Argentina, 2.6 for Chile, and 1.7 for Mexico. Taking all LIMTIP poor together (official and hidden poor), the depth of poverty is also dramatically deeper: 1.5 times deeper than the official income deficit in Argentina and Chile and 1.3 times higher in Mexico. Thus,

official poverty measures grossly understate the unmet income needs of the poor population. From a practical standpoint, these initial results point to a need for significantly shifting the coverage of poverty reduction programs to include the hidden poor in the target population and increasing the benefit levels to address the time-adjusted income deficits where appropriate.

Some additional results must be highlighted at this juncture. As expected, employed households (i.e., households with at least one employed adult) are more prone to time deficits than the nonemployed. But, while the stressful long hours of the professional classes are publically acknowledged, the time-related plight of the poor is not as clearly understood. Also, the incidence and depth of time deficits are greater among the income-poor than the income-nonpoor households in all three countries: terms of incidence, the gap was the widest in Argentina (70 versus 49 percent) and somewhat smaller in Chile (69 versus 60 percent) and Mexico (69 versus 61 percent).

The next point pertains to household structures. With demographic transitions showing a trend of traditional married-couple households on the decline in many Latin American countries, comparing single female-headed to married-couple households, the research found higher rates of poverty among the single female-headed households. Furthermore, for single female

headed households, the gap between official and LIMTIP income poverty rates is large: in Argentina 17.2 versus 27 percent; in Chile 25.3 versus 38.5 percent respectively, and in Mexico a more moderate but considerable gap was found at 50.1 (official) and 59.8 percent (LIMTIP). Finally, when children are present, especially children below the age of six, the difference between LIMTIP and official poverty is sizable. This is a point that will be revisited in the next section.

4.2 The time and income poverty of individuals

Just as for households, the LIMTIP poverty rate for individuals was higher than the official poverty rate. The share of hidden poor individuals in the total population is noteworthy (Table 2): 7 percent (183,000) in Argentina, 7 percent (432,000) in Chile, and 9 percent (9.5 million) in Mexico.

Table 2
POVERTY RATE OF MEN, WOMEN, CHILDREN AND ALL INDIVIDUALS (IN PERCENT)

		Official	LIMTIP	Hidden
Argentina	Men	7	13	6
	Women	7	12	5
	Children	16	28	12
	All	9	16	7
Chile	Men	9	15	6
	Women	11	18	7
	Children	19	29	10
	All	13	20	7
Mexico	Men	40	49	9
	Women	43	51	8
	Children	57	67	10
	All	47	56	9

Overall, there are more women than men who are LIMTIP income-poor (official poor plus hidden poor): 138,000 women versus 121,000 men in Buenos Aires; 380,000 versus women and 294,000 men in Gran Santiago; and 18.1 million versus 15.7 million respectively in Mexico. In the case of Argentina, it is basically a reflection of demographics. However, in Chile and Mexico, the demographic effect was compounded by the higher poverty rates (LIMTIP and official) of women. Thus, the "face" of poverty is feminized in the sense of poor women outnumbering poor men in all three countries. Again, this would not have been the case in Argentina if not for the fact that there were more women than men in the adult population. Overall, though, there were only small differences in poverty rates by gender, as Table 2 indicates (1 percent higher for men in Argentina, 3 percent in Chile, and 2 percent higher for women in Mexico).

However, the differences between adults and children were evidently more substantial, because households with children are more likely to be poor. In Argentina, the LIMTIP poverty rate for children was more than twice the rate for adults, with 65,000 children in hidden poverty; adding this to the official poverty headcount for children brings the total to 150,000 in LIMTIP income poverty. In Chile, the official and LIMTIP income poverty rates for children were 19 and 29 percent, respectively, corresponding to 9 and 12 percentage points above the rate for

adults. In Mexico, the gap was even larger, at 15 and 17 percentage points for official and LIMTIP income poverty, respectively, though the relative increase was smaller, given Mexico's high poverty rates. To put these percentages in perspective, using the LIMTIP definition for Chile, an additional 172,000 children are recognized as living in income-poor households, bringing the total to 487,000, while in Mexico the number was 3.7 million, bringing the total to about 26 million children living in poverty. One of the striking findings is that taken as a whole (income poor and income nonpoor together) most children live in time poverty; that is, they are members of time-poor households, surrounded by adults that face time deficits: 80 percent of children in Argentina, 70 percent in Chile, and 74 percent in Mexico.

Examining differences in time poverty rates according to gender, income poverty, and employment sheds additional light on the composition of time poverty. In incomepoor households, men had slightly higher overall rates of time poverty than women in Argentina (41 versus 39 percent) and Chile (36 versus 34 percent), but lower rates in Mexico (33 versus 38 percent). But it is important to understand that all of the male time deficit in Chile and Mexico and most in Argentina is that of employed men who suffer from an employment timebind: their hours of employment are very long and their labour force participation is higher as compared to women. For women

in income-poor households, most of those facing time deficits were working for pay –much like men– but suffering from a double bind: employment time-bind plus housework time-bind. What is important to note is that roughly 20 percent of women facing time deficits in Argentina and Chile and 33 percent in Mexico were nonemployed, and hence their time deficits were purely the result of a housework time-bind. This is true of almost none of the nonemployed men.

From the standpoint of employment status, the gap between official and LIMTIP income-poverty rates is greater for employed individuals than for the nonemployed, due to the larger time deficits of the former group. In Argentina and Chile, employed men and women had similar rates of both official and LIMTIP income poverty. In Mexico, however, employed men had higher rates of official (and LIMTIP) income poverty than women: 40 (49) percent compared to 33 (45) percent. For the nonemployed, the situation varies across the three countries. In Argentina, nonemployed men had higher rates of official (and LIMTIP) income poverty than women: 15 (21) percent compared to 11 (15) percent. In Chile, nonemployed men were slightly more likely to be income-poor: 18 (23) percent, compared to 16 (22) percent for women. And in Mexico, nonemployed women were more likely to be among the incomepoor: 50 (56) percent, compared to 43 (49) percent for nonemployed men. Two striking implications of accounting for time deficits

in the measurement of poverty become apparent. First, employed persons constitute a greater proportion of the poor under the LIMTIP poverty line than the official poverty line. Second, women account for a larger share of the employed poor when time deficits are taken into account.

In all three countries, workers facing the double deprivation of time and income poverty were concentrated in the lowest two quintiles of the earnings distribution, and since women are at a disadvantage in terms of earnings, the majority of workers facing this double deprivation were women. Yet, as measured by LIMTIP, poverty extends its reach beyond employed individuals in the bottom quintiles of the earnings distribution, at least much more so than the official poverty measure: adjusting official poverty lines for time deficits means that more of the employed LIMTIP incomepoor will be from higher up in the earnings distribution. In Argentina, 89 percent of officially income-poor individuals were from the bottom two quintiles of the earnings distribution, while only 74 percent of the LIMTIP income-poor were. By implication, 26 percent of the LIMTIP poor are from higher earnings brackets. A similar story is evident in Chile, where 90 percent of the officially poor but 71 percent of the LIMTIP incomepoor were from the bottom 40 percent of the earnings distribution. Finally, in Mexico, where poverty is more widespread, the numbers were much closer: 62 versus 58

percent. Breaking down these numbers by sex, women were overrepresented in the lower earnings quintiles in all three countries. Thus, even though their income poverty rates were lower, they comprised a majority of the income-poor among the bottom quintile—except in Mexico, where an almost equal share of employed men and women in the bottom quintile results in an almost equal share of the income-poor in the lowest quintile.

Next, the overall and gender incidence of time and income poverty by employment type were considered. While relatively small differences in poverty rates between men and women in the different employment categories in Argentina were found, ownaccount women workers were more likely to suffer from a combination of income and time poverty—however, they were outnumbered by men, since men make up a majority of own-account workers. Among irregular casual-wage (non registered) workers, on the other hand, the number of income-poor women was higher than that of men. Finally, an important finding stands out in Argentina: the largest single group among the LIMTIP income-poor population (women and men) was made up of regular (registered) workers, while among the official income-poor the largest single group consisted of casual workers. In Chile, by contrast, the rates of time poverty were higher for women than for men in all three employment types and the official and LIMTIP poor were both concentrated among regular-wage workers (although casual workers did make up a larger share of the LIMTIP than of the official income poor). In Mexico, income poverty rates were lowest for regular-wage workers, by a wide margin (34 percent of regular-wage workers suffer from LIMTIP income poverty, compared to 56 and 61 percent, respectively, of ownaccount and casual workers). The gender differences in poverty rates were highest among casual-wage workers, while the incidence of the double bind of time and income poverty was lowest among regularwage workers and roughly similar for unpaid family workers, own-account, and casual-wage workers.

4.3 A full employment simulation

In light of the evidence presented above, the aim of this exercise is to assess the ability of households to transition out of poverty should all adults of working age, who were previously part-time or not employed, become employed full-time (25 or more hours per week). While gaining access to paid work increases the income of the newly employed individual and household they belong to, some are liable to experience time deficits. Transitioning out of poverty will therefore depend not only on their prior income gap and the sufficiency of newly earned income to close it, but also on redressing time deficits, if and when they emerge.

Approximately 80 percent of the adults with part-time hours of employment or in nonemployment status—in other words, 80 percent of those who were shifted to fulltime employment in our simulation—were women. Given the previous findings, we know that when women are employed, they are prone to higher levels of time poverty, and therefore we can anticipate that while earnings will reduce poverty, time deficits will pull quite strongly in the opposite Furthermore, direction. the majority of all potentially employable women (approximately 60-65 percent) turned out to be mothers living with children under 18 years of age. Among the employable income-poor their rate was as high as 66-68 percent. As noted, in all three countries households with children are more vulnerable to income and time poverty than households without children. This immediately raises doubts about whether additional earnings can be sufficient for a substantial number of households to escape income poverty if interventions to redress time deficits are not forthcoming.

The findings suggest that, in fact, the baseline hypothetical full employment scenario leads to a very substantial reduction in the official poverty rate: by 83 percent in Buenos Aires, 72 percent in Gran Santiago, and 48 percent in Mexico. Nonetheless, job creation was not the answer to poverty reduction for all of these households. Measured by LIMTIP, the decline in income-poverty rates is less robust: 45, 38, and 22 percent for Argentina, Chile, and Mexico, respectively (Table 3). In fact, when the before-and-after simulation results are compared, hidden poverty—the difference between the official and LIMTIP rates—stays almost the same for Argentina and Chile and even increases considerably in the case of Mexico.

 Table 3.

 ACTUAL AND SIMULATED INCOME POVERTY RATES (IN PERCENT)

	Argentina		Chile		Mexico	
	Actual	Simulation	Actual	Simula- tion	Actual	Simula- tion
Official Income-poor	6	1	11	3	41	21
LIMTIP Income-poor	11	6	18	11	50	39
"Hidden Poor"	5	5	7	8	9	19

Among the "hardcore" poor —households that remain in income poverty despite being full time employed—it is important to distinguish between three different groups. The first group of households did not experience any change in their poverty status because they contain only ineligible adults; that is, adults who were disabled, retired, in school, or in the military. Poverty alleviation for these households cannot be effectively accomplished via job creation and social cash transfers are absolutely essential. The second group of households did not experience any change in their poverty status because all the eligible adults were already employed full time. The third group consists of households that, even though they have employable adults

who were assigned full-time employment in the simulation, remain below the LIMTIP poverty line. Some households in this third group will be officially income-poor, while the others would belong to the hidden poor (i.e., households with incomes above the official threshold but below the LIMTIP poverty line).

As expected, in all three countries full employment brought about the most dramatic and positive impact on those households in official income poverty but with time to spare; namely, the timenonpoor. The share of such households in the total number of households fell from 3 to 0 percent in Buenos Aires, from 6 to 1 percent in Chile, and from 15 to 2 percent in Mexico. From a policy perspective, this reinforces the idea of custom-tailoring interventions. This is precisely the group that can benefit from job creation, even under current labour market conditions (i.e., prevailing wage structures).

But what works for one group may not work for others. As can be seen in Table 4, access to a job will not be a solution for households in time poverty. For them (women, for the most part), their time poverty must be addressed simultaneously with job creation—as clearly proposed by the family-work life reconciliation agenda—if they are going to benefit from the new job opportunities created, for example, through a successful inclusive growth strategy.

Table 4
PERCENTAGE OF LIMTIP INCOME-POOR HOUSEHOLDS IN THE TOTAL NUMBER OF HOUSEHOLDS BY TIME-POVERTY STATUS, ACTUAL AND SIMULATED

	Argentina		Chile		México	
	Actual	Simulation	Actual	Simulation	Actual	Simulation
Income-poor and Time-poor	8	6	12	10	35	37
Income-poor and Time-nonpoor	3	0	6	1	15	2

In the full-time employment scenario, the overall time-poor segment of income-poor women actually grew in Chile and Mexico, indicating that a proportion of the newly employed women ended up being timepoor and income-poor, while in Argentina, this segment showed no change in its size. On the other hand, the time-poor segment of income-poor men stayed constant in Argentina and Mexico, while it showed a slight decline in Chile. This inequity highlights the hard choices women are called on to make between paid and unpaid work. Recall that among the employed, prior to the simulation, women had higher rates of time deficits than men on both sides of the poverty line. This disparity widened in a marked fashion with full-time employment.

One of the most disturbing findings in the full-time employment scenario is that over 95 percent of income-poor children in all three countries would find themselves living with at least one time-poor adult. This finding must be taken into account in decisions regarding prioritization of social investments; it highlights the importance

of prioritizing policies specifically aimed at children in poor, employed households as an integral part of job creation strategies. Without such policies in place, job creation programs are set to have undesirable effects on the well-being of the children of the working poor.

Nonetheless, the fact is that under the simulation scenario most children in income-nonpoor families would also end up living with at least one time-poor adult: support for policies specifically aimed at easing the time crunch faced by poor working parents may very well come from middle-class working parents as well, leading to consideration of universal provisioning of child-care and after school programs. The simulation confirms that the objective of increasing the labour force participation of women, especially from low-income quintiles, requires integrated policies. As long as low wages prevail and child-care or afterschool programs are sparse, the goal of poverty reduction cannot be met fully.

5. The policy lessons of LIMTIP findings: revealing the interlocking domains of disadvantage

Despite widely differing economic conditions and social and economic policy regimes across the three countries studied, some common themes emerge. Specifically, the LIMTIP framework and findings suggest that for policies to reduce time-adjusted income poverty, there is a need to pay attention to four interlocking and gender differentiated-domains: labour markets, demographic structures, redistributive policies and social provisioning.

a) Current labour market outcomes indicate a much greater need for regulation of the length of the working day as well as for gradual increases in wages. The vast majority of LIMTIP poor households have members who are already employed for very long hours, men in particular, and hidden poverty rates have shown that regular workers cannot be presumed immune to poverty-inducing time deficits. For women, addressing their lower labour force participation must clearly come hand-in-hand with higher wages and, above all, as the full-time employment simulation has revealed, inclusive growth policies will not benefit them unless the work-life reconciliation agenda receives due consideration. The importance of the decent job creation agenda is self-evident and requires little emphasis in this context. But also, if men's employment hours are not reduced and if socialization of care provisioning is not expanded, a more equitable intra-household distribution of responsibilities cannot be achieved.

b) Demographic structures and household composition greatly influence the amount of time needed to fulfil household production requirements. Single-headed households as well as households with young children (single parent and

traditional head and spouse households) are at the greatest disadvantage when time deficits are taken into account. The emerging picture for children, as we have noted, is particularly alarming. And since the vast majority of children reside in households with time deficits, increasing hours of employment is not a real option for these households; nor can it provide an adequate poverty reduction solution for poor households, not unless extended care provisioning is put in place. There can therefore be a tension between inclusive growth's central and just objective of job creation for all and demographic structures; a tension that can be addressed and mediated only in conjunction with some combination of care provisioning, regulation of the length of the working day, and higher wages.

c) Current levels of taxation and of social protection/assistance (i.e., cash transfers) are not reaching the hidden poor because they fall outside the radar of official statistics. Furthermore, the level of transfers is inadequate to meet the deprivations of those in needs-of the official poor and the hidden poor uncovered by the LIMTIP methodology. The findings essentially show that there is a "hidden tax" imposed on time-deficient households and the non-harm and equity promotion principle of progressive taxation is violated. Remediation will depend on national contexts, as policy action has fiscal budgetary implications; but the equity issues raised by this study point to needed discussion for modification of the present day regime of tax credits, exception from taxation, and levels of cash transfers to counterbalance what one might call the hidden time tax imposed on some households.

d) Availability and access to public provisioning of social services greatly affects the ability to meet household production requirements. This proves to be especially the case for care services needed for infants, young children, and those of school age, which impacts women's ability to work for pay and determines in fact if they end up trading one form of poverty (income) for another (induced by time deficits). Alternatives to public service provisioning do exist. Examples include arrangements whereby establishments business and other workplaces may offer onsite services pre-school children (corporatist model); private child-care centres can be enlisted for those that can afford them (privatization model); and informal service provisioning by neighbours and relatives (for pay or free of charge) may be available. Socialization, marketization, or familialization of care are indeed alternative pathways, but leaving aside for the moment which forms may be best compatible with poverty reduction and promotion of gender equality, the evidence provided by this research points to the need for debate and discussion, if not prioritization for all LIMTIP poor households, in view of the implication of time deficits for poverty reduction.

6. LIMTIP policy lessons: unlocking the binding constraints of time deficits

The preceding considerations prepare the groundwork for a discussion on how the above issues can inform policy for distinct groups among the poor, including from a gender perspective.

We can begin by considering the nonworking poor. As we have seen, 20 percent of women who do not work for pay (in non-employment status) in Argentina and Chile and 33 percent in Mexico are facing strong enough housework-bound time deficits that were they to continue fulfilling their household's production requirements, they would not be able to avail themselves of paid forms of work, not without falling even deeper into time poverty. This is not the case for unemployed men.

The full employment simulation scenario indicates that the vast majority of the newly

employed would be women and a large proportion among them mothers with children under 18 years of age and only a high school degree or less. These findings invite reflection. The results bluntly show that by the official poverty count, employment creation will work wonders. However, if poverty impact assessment did take into account the time deficits faced by the potentially employable adults (again, mostly women) in income-poor households, the emerging picture would show that job creation is likely to be less effective: the before and after gap between official and LIMTIP poverty would remain unchanged in Argentina and Chile and would even increase in the case of Mexico. The corollary, on the other hand, is that the effectiveness of job creation policies for poor women and their households can be greatly enhanced by removing the binding and poverty inducing constraints of time deficits.

From a gender perspective, a fundamental policy concern emerging from the findings is that the nexus of labour market / household production realities faced by women and men, unintentionally or not, is reinforcing the "male breadwinner" model. More often than not, among poor households that desperately need additional

income, it does not "pay" for women to be full-time workers, due to a combination of wage differentials and precarious work for women, men who are already working very long hours for slightly better pay, and the lack of social care provisioning. Thus, women were found to be worst off from the perspective that they were members of income-poor households, individually time-poor, and belong to the bottom of the earnings distribution. As the work-family reconciliation agenda underscores, efforts to steer economic development toward inclusive growth via policies that encourage employment generation, centrally important as they may be to poverty alleviation, require attention to be paid to care provisioning. This is important for enabling women's labor force participation but it is also especially important for children's wellbeing.

For full employment to become a reality, macroeconomic and sectoral alignment that places job creation at its core is essential. As structural conditions and labour market functioning have not always delivered sufficient jobs, innovative and flexible "employment guarantee" policies, an active labour market intervention, must receive greater consideration, especially in view of the fact that it can be designed in ways that fill in gaps in employment without increasing time deficits⁴. These policies are helpful when labour market conditions are slack,

in that they effectively put in place a wage floor, regulated work hours, and a minimum benefits package while providing part-time employment. But once again, policy cannot stop at getting people into jobs, because the (newly) employed also face the potential threat of poverty-inducing time deficits.

For the working poor, the next point is crucial.

It is well understood that poverty reduction and improvement of gender equity require an integrated policy agenda. The first policy area involves moving women gradually toward full-time paid work, which should be incorporated as a main goal of labour market transformation. However, the research findings concur that in order to make employment a truly winning proposition for women, a second policy area entails expansion of early childhood development and afterschool enrichment programsoffering hours of operation that are appropriate for the work schedules of parents. This is not a luxury: we have seen that the coresponsibility of the state in care provisioning is central to reducing poverty-inducing time deficits and enabling women to allocate more time to employment without pushing them into hidden poverty. Rather than thinking of these interventions (early childhood development, after school program investments, but also home based care) as "costs," proper impact assessment should look at their effect on employment, income distribution, and (time-adjusted) income

⁴ For a discussion see Employment Guarantee Policies: A Gender Perspective", Poverty Reduction and Gender Equality series, Policy Brief #2, UNDP/Gender Team Series, April 2010 http://www.undp.org/content/undp/en/home/librarypage/womens-empowerment/policy-brief-gender-equality-and-employment-guarantee-policies-html

poverty. Previous research⁵ clearly shows that women and poor households stand to benefit substantially, as these interventions result in pro-poor growth, and that such budgetary outlays are, in fact, partially deferred once economy-wide employment, output, and overall tax revenue are taken into account.

Next, attention should be paid to the fact that half or more of the hardcore poor (fully employed and in poverty) by LIMTIP estimates consist of the *hidden* poor, which provides evidence that using the official poverty measure to monitor poverty alleviation can leave a substantial portion of the working poor off policymakers' radar. While the poverty situation of ownaccount and casual workers is considerably bleaker when time deficits are taken into account, we must not lose sight of the fact that a substantial segment (ranging from 4 percent in Argentina to 10 percent in Mexico) of regular (registered) workers were also among the hidden poor and therefore similarly vulnerable. Thus, policies to

address time and income deficits can benefit regular workers as well as casual and self-employed workers to a much more equal extent than implied by the official poverty measure.

This is connected to the next point. Public action to alleviate the burdens of time and income poverty can and should be based on alliances that cut across gender and class lines, since the estimates indicate that workers suffering from income and time deficits were divided nearly equally across the sexes and included workers from the middle quintile (and in Mexico, even higher quintiles) of the earnings distribution. In this respect, regulation of the length of the working day is important for all workers but much more so for men, whose hours of employment are 20-30 hours longer than those of women, with some of them reaching 60-70 hours of employment weekly.



7. Further policy considerations

Much like fighting official income poverty, LIMTIP leaves open diverse remedial policy options. As their trade-offs are being considered, the above findings suggest that there is a need for deepening the policy dialogue on two issues. The first issue relates to the means through which bridging of income gaps can be achieved and the interplay therefore of labour market interventions and cash transfers. Labour market interventions require a much more transformative approach to existing institutional agreements. These include the progressive realization of living wages for men and women, and a regulatory framework for effectively reducing long hours of paid work (all of which are key to economic empowerment and central to the decent job creation agenda). But in addition, the persistence of genderbased wage differentials, despite gradual changes in occupational segregation, must

be addressed— and for that, equal pay for equal work and comparable worth policies ought to be revisited. If, for a variety of reasons, labor market challenges are not tackled directly, debate must begin over how to put in place a comprehensive approach to close income gaps that also addresses poverty-inducing time deficits head-on. In the case of unconditional or conditional cash transfers, discussion must clarify whether the transfers are meant to replace deficits in employment opportunities as such or to close earned income gaps. This is an important and ongoing discussion that is critically important from a gender perspective. However, independently of the side of the aisle on which one stands regarding the need for labor market transformation and the role of cash transfers, to the degree that the status quo is accepted in terms of gender-based wage differentials and low female labour force participation rates, as well as low wages for men, cash transfer levels, to be effective, must be based on accurate calculations of the depth of poverty, such as those provided by LIMTIP.

The second issue concerns alternative pathways that can improve the wellbeing

of the young. With time deficits clearly identified for poor and nonpoor families with children, there is a choice to be made between allocating scarce financial resources to family allowances, conditional cash transfers (CCTs) and expanding the public provisioning of social care (e.g., via early childhood development services and after school enrichment programs). The tension is an important one, and rests on the gender implications of familialization and socialization of care. The above findings show unequivocally that the need for public dialogue on this issue is urgent: nonemployed mothers receiving child support are less likely to face poverty-inducing time deficits. Without the expansion of care provisioning and reduction of their household responsibilities, it is disingenuous to promote the idea that women "can do it all" and it must be understood that women who raise and care for children cannot fully participate in labour markets. Being a lowwage mother or child-carer means trading one form of poverty (income) for another (time-deficit induced). While low-cost care provided by domestic workers has helped some employed women avoid this trade off, the challenge remains. Furthermore, a gender equitable redistribution of intrahousehold responsibilities is hard to achieve for many households: the fact that poor men are already working very long hours ends up reinforcing gendered norms, roles and responsibilities that disadvantage women.

8. Concluding remarks

The LIMTIP study has revealed the hidden deprivations time deficits impose on significant segments of the population. In fact, we have seen that time deficits interact with a lack of job opportunities for some; low wages and, hence, inability to attain a decent income within reasonable hours of employment for others; and inadequate levels in the social provisioning of care (especially for households with children) and other essential services (e.g., transportation) - keeping a considerable proportion of the population locked in

the grip of poverty. Public policy and public action cannot afford to wait for positive outcomes to magically "trickle down"; nor can social development interventions be expected to deliver on the promise of poverty reduction in light of the interlocking nature of time deficits and joblessness, low earnings and lack of adequate levels of social provisioning. A set of interlinked interventions that addresses these challenges in a coherent manner must lie at the core of any inclusive and gender-equitable development strategy that is worthy of the name. It is hoped that the findings of this study will contribute to ongoing discussion and debates over how to advance living conditions and social inclusion for all.

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