The influence of the mother's power on her child's labor in Mexico Iliana Reggio

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According to a March 2002 report of the International Labour Organization (ILO), around 352 million children between 5 to 17 years old were engaged in some type of economic activity in 2000, and 211 million of them were less than 14 years old. ILO statistics also report that participation rates in 2000 for children between 5 and 14 years old were 25% in Sub-Saharan Africa, almost 19% in Asia and 17% in Latin America. These figures show child labor as a pervasive phenomenon. It is therefore relevant to understand the reasons behind it, specially for developing economies where it is more spread, in order to find ways to diminish its negative effects on children's development.

Several empirical papers have found evidence that children are affected differently depending on which parent receives a certain benefit or which one in the household has more decision power.¹ This suggests that the intra-household distribution of decision power is relevant for children's wellbeing. Then, households that may not differ on observable characteristics, such as total income, can end up with different decisions about their children's activities. And this may depend on the father's and mother's relative bargaining or decision power.

This paper analyzes the relationship between relative bargaining powers in the household and the amount of child labor. The analysis is crucial in order to predict the impact of certain policies, which are frequently suggested, that tend to give more power to the mother in the view that this would lead to a reduction of child labor and therefore an improvement in the child's welfare.

Several negative effects of child labor can be mentioned, such as less education achievements associated to the reduction of children's future welfare and perpetuation of poverty.² However, there are also some potentially positive aspects of the work of children, since for instance, in certain activities they can accumulate useful experience and maybe more important, their work may allow them to cover the costs of attending school and help their low income families. Consistent with this idea, the goal of some policies has been to cover the costs of education, trying to reduce children's labor without hurting their chances of education.

Given that the main goal of this paper is to estimate the effect of parents' relative power on the amount of child labor, a collective household model provides an appro-

¹See, among others, Duflo (2000), Thomas (1990), Thomas (1994) and Thomas et al. (2002)

²See Edmonds (2005), Psacharopoulos (1997), Patrinos and Psacharopoulos (1997), Ranjan (2000) among others. For a complete survey see Bhalotra and Tzannatos (2003)

priate theoretical framework.³ In the paper I develop a collective household model with child labor, based on Bacolod and Ranjan (2004). Regarding the effect of bargaining power, the model predicts that child labor will decrease if the bargaining power of the parent with higher aversion for child labor increases.

The data used in this paper comes from the Encuesta Nacional sobre Niveles de Vida de los Hogares, Mexican Family Life Survey (MxFLS) for 2002. This survey is conducted by Universidad Iberoamericana, CIDE and INEGI (Mexican Statistical Institute). It covers around 8000 households and it is representative at national, urban and rural levels from all states in Mexico. All individuals interviewed in the first wave will be followed in the second wave in 2005, regardless of whether they remain in the same household. This survey contains detailed information about children and their households. There are basic questions related to school attendance and performance, and also about how much time children spend working (outside or at different tasks at home). Another important feature of this survey regarding the question this paper addresses is that there is information about property of some assets, such as land, or the house, and also about income (labor and non labor) for each household member. This information is very useful, among other things, to obtain an estimation of intra-household bargaining power that will allow me to estimate the impact on the amount of child labor.

In my estimation I consider children between 10 and 14 years old and two different definitions of working children. The first one, a more strict one, includes only paid workers. The second one, a more broad one, includes the strict definition and also children that work at least 10 hours per week, as paid workers or not. The activities in which these children are involved include agricultural activities, domestic housework, carrying firewood or water, or taking care of siblings or other members of the household.

A first look at the data shows that in the sample, 41% of the children between 10 and 14 years old falls in the broad definition and 12% in the strict one. On average working children (for both definitions) are less able, older, their parents ar less educated and they come from rural more than from urban households. Girls tend to work more at home and boys more outside, as paid workers. One of the main concerns regarding child labor is the substitution of schooling and the consequent effect on future wellbeing. As expected, children that lie in the first definition got their attendance to school more affected than the ones under the broad definition. 77% of paid child laborers attend to school as opposed to 96% of non-working children.

The estimation procedure consists in two steps. First, I estimate the bargaining power using the decision questions that appear in the survey. I use the questions about

³These models assume that the household maximizes a utility function that is the weighted average of each member's utility. These weights are given for the relative bargaining power of each member. See Chiappori (1992).

⁴Rubalcava and Teruel (2004)

which member of the household decides to sell/buy the house and who decides to sell/buy domestic appliances. And I use the following explanatory variables: mother's relative education, mother's relative cognitive capacity, mother's background (given by grandparents' education) and sex ratio in the community. I find that relative ability and background have the expected effect on mother's bargaining power. Mothers with relatively higher ability or with relatively more educated parents, are more likely to make decisions regarding household assets. Relative education, although presenting the correct sign, does not result significant.

The second step is the estimation of the impact of the mother's bargaining power on child's labor. The most important result is that higher mother's decision power is associated with less hours of child labor. This implies that the impact of certain policies, which are frequently suggested, that tend to give more power to one of the parents, may have different results depending on which parent receives the benefit. Specifically more power to the mother would reduce the amount of child labor.

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